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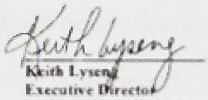
Whitecourt - Edson Regional Grazing Plan

Alberta
SUSTAINABLE RESOURCE

APPROVAL PAGE

This plan has been endorsed by:



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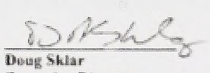

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Date: Nov 20, 2007

DISCLAIMER

The grazing information and allocation recommendations in this plan are at a landscape level only and provide strategic direction for how and where grazing and timber can be integrated. Additional field inspections and consultation with other resource management agencies will be required to assess the suitability of any grazing and the integration of grazing and timber operations.

ACKNOWLEDGEMENTS

The Department of Sustainable Resource Development would like to express sincere thanks to the Foothills-Woodlands Regional Grazing Timber Advisory Committee for providing valuable guidance and advice into the development of the first regional grazing plan done in the Province. Their continued input will be sought for the implementation, review and future amendments that might be necessary to this plan.

Heath Schneider, Foothills-Woodlands Regional Grazing Timber Advisory Committee Chair

Peter Aschenmeier, Foothills-Woodlands Regional Grazing Timber Advisory Committee Member

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EXECUTIVE SUMMARY

A team of government agrologists, foresters and biologists, with the cooperation and support of the grazing and timber industries in the area, have developed a Regional Grazing Plan (RGP) for the Whitecourt-Edson area of west central Alberta. The boundary of the planning area was determined by the planning team and endorsed by the timber and grazing industries through the Regional Grazing Timber Advisory Committee (RGTAC). The plan boundary recognizes the existing demand for new grazing opportunities and the potential for future demand, and it includes all public land contained within the planning area.

Guiding principles for development and implementation of the RGP require that the interests of existing grazing disposition holders will be addressed prior to new grazing allocations. In addition, they recognize that grazing and timber operations must be integrated to ensure sustainability of forage and fibre on public land managed for sustained timber production. Further, the principles reflect that grazing and timber industries and Government need to work closely together and that this plan must be monitored and regularly updated to ensure that goals and objectives are being achieved.

A Sustainable Regional Carrying Capacity (SRCC) was calculated for the planning area, which is an estimate of grazing potential at a landscape level. This involved using proposed timber harvesting information and estimates of grazing potential combined to approximate a sustainable carrying capacity by Forest Management Unit (FMU). The SRCC represents the least amount of grazing that can be sustained within each FMU given the natural capabilities of the land and the planned timber harvesting over the next 60 years (See Table 4).

Strategies for the integration of grazing and timber and the allocation of new grazing opportunities were developed for the planning area. Options for allocation incorporated provincial direction and considered recommendation from the RGTAC. The development of the SRCC determined that available grazing within the planning area is scattered and fragmented and that most FMUs included within the plan boundary do not contain sufficient net available grazing to support new grazing dispositions. However, FMUs W6, W11 and W13 contain sufficient net available grazing to consider new allocations but the scattered and fragmented nature of the land suitable for grazing is best suited to large fixed grazing dispositions.

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INTRODUCTION

The purpose of the Whitecourt-Edson Regional Grazing Plan (RGP) is to integrate grazing, timber harvesting and reforestation within the boundaries of the plan. The intent is to provide the necessary direction to government and industry on how integration will occur where public land is managed for sustained yield of timber and forage.

The RGP outlines objectives and actions necessary to achieve this integration. It has a reporting and monitoring procedure (performance assessment) to assess if objectives are being achieved and outlines when the plan should be reviewed, and if necessary, altered.

This plan is enabled by Alberta Sustainable Resource Development's (SRD) Policy Directive on Integration of Grazing and Timber Activities. This directive was approved by the Department of SRD in June 2006 and the Whitecourt-Edson RGP is the first such plan done as described in the above policy and associated manual.

The RGP was developed by a government team of agrologists, foresters and biologists. A Regional Grazing Timber Advisory Committee (RGTAC) was also created as a result of the policy directive, and is comprised of local grazing and forest industry representatives. The RGTAC was instrumental in the plan's development through their regular advice to the planning team during its creation.

SCOPE

This plan applies to only the public land contained within its boundaries and to both existing and new grazing allocations. The expected outcomes are:

- Guidance to the livestock producer(s) and SRD staff to make informed choices and decisions about grazing opportunities in identified areas of Green Area and White Area with timber commitments;
- Identification of potential opportunities for grazing-timber integration in a manner that proactively helps reduce land use conflicts;
- Regional grazing assessment information that can be integrated in the development of Detailed Forest Management Plans;
- A strategy to guide allocation of grazing dispositions in the planning area that addresses existing grazing disposition holders' interests prior to new allocation; and,
- Reduced costs and improved efficiencies to the industries.

RGP Boundary

The RGP boundary encompasses existing grazing dispositions that occur on Green Area land and White Area land managed for sustained timber yield within the Woodlands and Foothills SRD administrative areas. White Area land for sustained timber yield is identified in the Whitecourt-Anselmo Public Land Use Strategy and Cold Creek Regional Integrated Decision.

The boundary also recognized where the current demand existed for new grazing dispositions and where, in the opinion of SRD, the likelihood existed for new demand. This involved the interpretation of grazing potential, which formed the basis for much of the analysis that was undertaken.

There are 15 forest management units (FMUs) that are partially contained within the boundary of the RGP (Figure 1; Table 1). All of the land within the Green Area FMUs is managed for sustained forest management; the White Area FMUs have only some of the identified public land being managed for

sustained timber production. Further information on the forest companies and their respective timber allocations can be found in Appendix 1. The forest management units are an important link to forest management planning and to the integration of timber and grazing.

The RGP boundary was determined by the SRD planning team and endorsed by the Regional Grazing Timber Advisory Committee and SRD senior management.

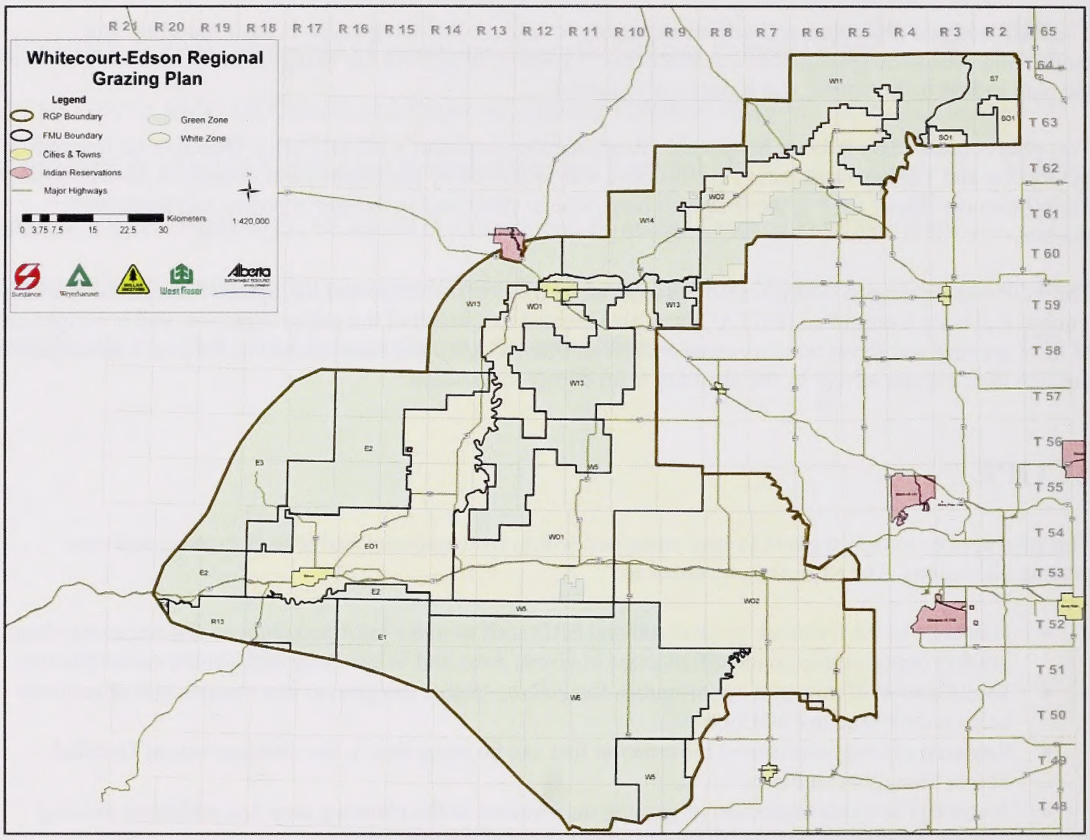

Figure 1. Map of the Whitecourt-Edson Regional Grazing Plan and FMU Boundaries.

Table 1. Forest Management Units within the Whitecourt-Edson Regional Grazing Plan.

	Forest Management Agreement Holder	FMU
Green Area	Millar Western Forest Products	W11
		W13
	Blue Ridge Lumber	W14
	Weyerhaeuser – Edson	W5
		W6
		E1
		E2
	Sundance Forest Products	R13
	Hinton Wood Products	E3, E4
	None	S7
White Area	None	S01
	None	W01
	None	W02
	None	E01

PRINCIPLES

Four key principles were agreed upon and used throughout the development of the RGP and its associated management strategies. These principles will be followed during the implementation of the RGP:

- **Respect for existing disposition holders' interests** – The interests of existing grazing disposition holders will be addressed prior to new grazing allocations.
- **Sustainability** – Grazing and timber will be integrated to ensure that there is sustainable forage and fibre on public land managed for sustainable timber production.
- **Collaboration** – The grazing and timber industries along with Government need to work closely together.
- **Adaptable and flexible** – The plan and its resultant actions need to be regularly reviewed and updated to ensure the goals and objectives are being achieved.

GOALS AND OBJECTIVES

The goals, objectives, indicators and targets described below are essential to help ensure that the integration of grazing and timber activities is done in a way that is sustainable for the production of forage and fibre.

Table 2. Goals, Objectives, Indicators and Targets for the Whitecourt-Edson RGP

Goals	Objectives	Indicators	Targets
A characteristic or quality considered to be important	*A broad statement describing a desired future condition for a value*	*Measurable component of a resource value*	*Specifies the desired conditions, state or range for the indicator*
Sustainability – Grazing and timber will be integrated to ensure that there is sustainable forage and fibre on public lands managed for sustainable timber production.	A sustainable level of grazing will be estimated and maintained for the RGP area.	Develop Sustainable Regional Carrying Capacities (SRCC) that consider net available landbase, spatial distribution and amount of grazing potential, and impacts of timber harvest over time.	Allocations of new grazing will consider the grazing potential and SRCC (where available) and as described in the RGP. Range health is maintained on grazing dispositions. Within areas managed for grazing, long term forage production is not impaired as a result of timber harvesting.
	A sustainable level of timber will be estimated and maintained for those portions of the RGP managed for sustained timber management.	For sustained yield timber areas, an annual allowable cut is determined that considers the range resource and its utilization within the forest management unit Amount of forested land remaining in productive forested state for timber productions within a sustained yield forest management unit.	Within areas managed for sustained yield timber, timber production is not impaired as a result of grazing. Regeneration will not be damaged by domestic stock grazing to the point where the overall stocking is reduced below the reforestation standard.
Greater collaboration amongst all parties.	The grazing and timber industries along with Government will work together to ensure integration of range and timber resource use.	Grazing and timber integration issues will be addressed.	Information exchange occurs amongst all parties. Grazing Timber Agreement (GTA) is to be agreed to by both parties and endorsed by SRD. Improvements to the plans and operating guidelines to integrate grazing and timber occur.
Existing grazing disposition holders' interests will be addressed.	Prior to new allocations for grazing, existing grazing disposition interests will be addressed.	Impact of timber harvest on existing grazing dispositions will be estimated and communicated to the disposition holder.	All existing grazing disposition holders will be aware of potential impacts to their grazing from proposed timber harvest and reforestation where the spatial harvest sequence information exists. All existing disposition holders will have the opportunity to apply for additional grazing.

Goals	Objectives	Indicators	Targets
A characteristic or quality	*A broad statement describing*	*Measurable component of a*	*Specifies the desired*

considered to be important	a desired future condition for a value	resource value	conditions, state or range for the indicator
Landscape level biodiversity is conserved.	Maintain habitat for all naturally occurring species (plants and animals) within the planning area.	Range health is maintained. Permanent clearing for range improvements will be minimized.	Landscape targets for habitat are maintained for the Green Area portion of the RGP. Improved grazing would not exceed 40% of suitable land on a grazing disposition from White Area designated for sustained timber yield.

ANALYSES OF GRAZING POTENTIAL

Determination of Sustainable Regional Carrying Capacity

There is considerable diversity in the planning area since it includes portions of four natural sub-regions and the fact that several different timber companies are operating in the plan area. This required multiple analyses of very large datasets. As a result, it was decided to complete the assessment of grazing potential and timber harvest impact at the FMU level. This also allows for future planning and decision-making on "Sub-Units" of the planning area.

RGP maps and data tables, combining estimates of grazing potential and proposed timber harvest sequencing, have been developed for each FMU and, where available, for each of the six 10-yr sequences to estimate the Sustainable Regional Carrying Capacity (SRCC). The SRCC represents the least amount of grazing that can be sustained within each FMU given the natural capabilities of the landscape and the timber harvesting planned in the FMU throughout the next sixty years. At the FMU level the lowest net available grazing through the six sequences is the SRCC (Table 4 and Tables 5 through 12). Detailed information on the procedures used in this analysis can be found in a separate technical report describing the detailed description of GIS Analysis for the Whitecourt-Edson RGP.

The net available grazing for each FMU was determined using the process described below (Figure 2). It is important to note that the net available grazing and SRCC area estimate of grazing potential is at a landscape level and should be used as a guideline for planning purposes only. Further detailed range inventory at an operational level would be needed to determine carrying capacities for grazing dispositions.

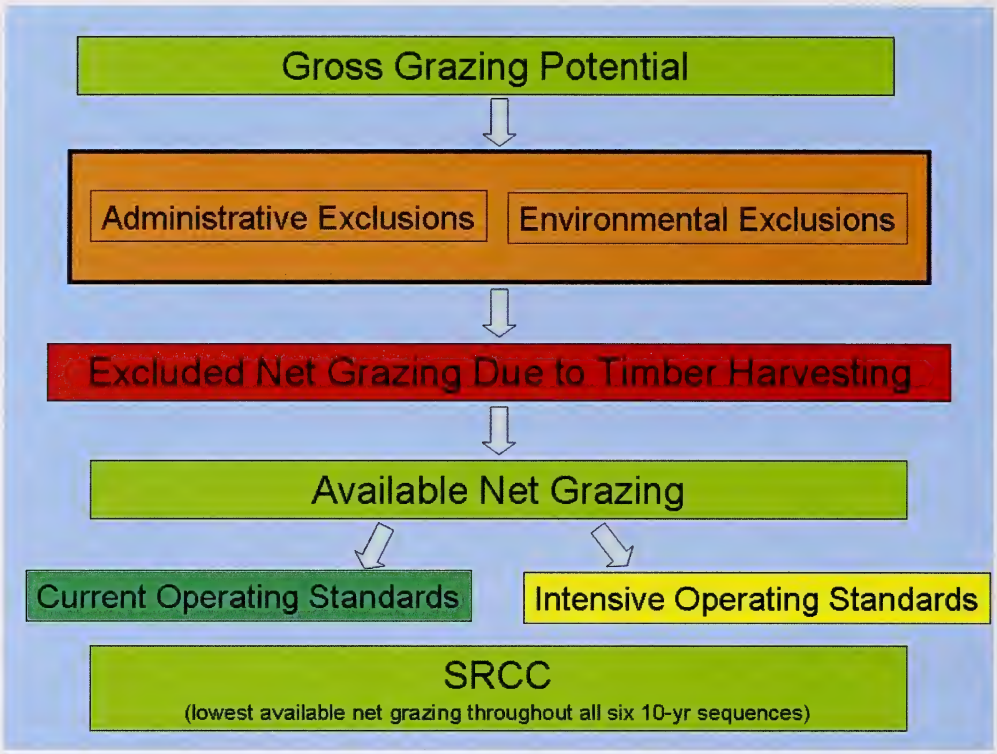

Figure 2. Flow-chart summarizing the steps in the data analysis to determine the SRCC for each FMU within the Whitecourt-Edson RGP.

Gross Grazing Potential

Gross grazing potential, the amount of area supporting vegetation suitable for livestock grazing, was estimated by classifying Alberta Vegetation Inventory (AVI, 2004 provided by Forest Management Branch, SRD) polygons into ecosite phases (Beckingham, Corns and Archibald, 1996). AVI does not exist for a portion of the White Area (Figure 3.1 in Appendix 2), therefore gross potential for this portion of vacant public land was estimated by air photo interpretation. Stocking rates were assigned to each ecosite phase using the "Range Plant Community Types and Carrying Capacity Guide for the Lower and Upper Foothills Subregions" (Rangeland Management Branch, SRD). Ecosite phases were then grouped into grazing potential categories (Table 3).

Table 3. Grazing potential category stocking rates in AUM/ac and ha/AUM

Grazing Potential	AUM/ac	ha/AUM
Good	>0.2	2
Fair	0.1-0.2	2-3
Poor	<0.1	3-4
Non-use	0	>4

Areas classified as non-use grazing potential do not support vegetation suitable for livestock grazing and were therefore not included in net available grazing.

The grazing potential categories should be used as a guideline for landscape planning purposes only. The RGP grazing potentials are not intended to replace detailed rangeland inventory completed by SRD. Detailed rangeland inventory would be required to develop carrying capacities and operational management plans for grazing dispositions.

Available Net Grazing

Available net grazing represents the amount of grazing suitable for allocation within each FMU. Available net grazing was determined by removing areas from the gross grazing potential that were considered either administrative or environmental exclusions (Figure 3; Table 3.3 in Appendix 2). The amount of area removed as exclusions from each FMU is listed in Table 3.4a -3.4o in Appendix 2.

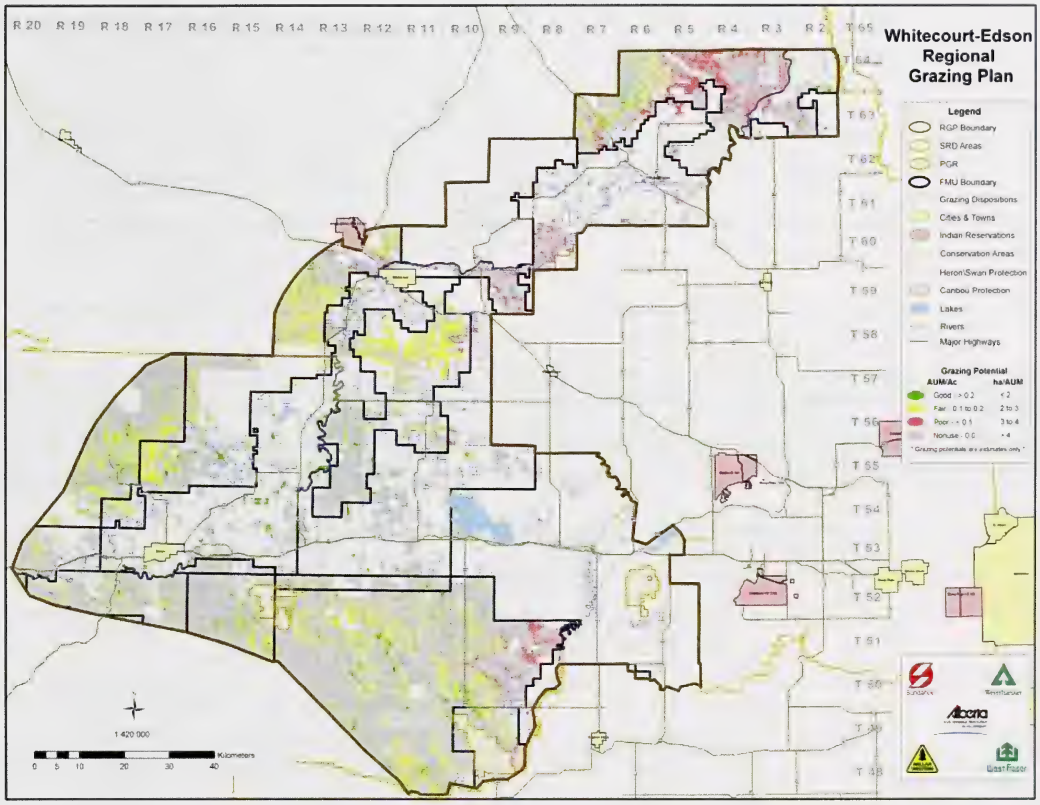

Figure 3. Map of grazing potential and administrative and environmental exclusions for the Whitecourt-Edson RGP

Therefore grazing potential removed as administrative and environmental exclusions (Table 3.5 in Appendix 2) did not contribute to the development of the net available grazing in this landscape analysis. Administrative exclusions should, for the most part, be considered permanent exclusions from the grazing potential.

Non-native vegetation and riparian areas, included as environmental exclusions within the analysis, could be considered as grazing potential at the operational level. They were not included in the SRCC determination because:

- they tended to inflate the estimate of good grazing potential within the landscape analysis;
- their linear or scattered distribution can make them difficult to manage; and,
- riparian areas often require detailed inventory and management planning at an operational level to ensure that their unique values are addressed.

Excluded Net Grazing Due to Timber Harvesting

The impact of timber harvesting affected the estimate of net available grazing. To analyze the impact of timber harvesting, spatial harvest sequence information was provided by the timber industry, where it was available, and it was divided into six 10-year sequences (*Grazing and Timber Integration Manual*, page 13). The timber harvest information used in this analysis was the most current information available. It should be noted however that this information is subject to change due to numerous factors including fire, pine beetle and adjustments for other industrial activity on the forest management land base. Significant changes to timber harvest plans could be a trigger prompting a review and update of the RGP.

Within each 10-yr sequence, existing deciduous or coniferous cutblocks less than 14 years old and proposed cutblocks to be harvested within that particular 10-yr sequence were temporarily removed from the available net grazing and were therefore not included in the SRCC. Cutblocks less than 14 yrs-old were removed from the analysis because they were considered regenerating cutblocks that may not have achieved performance standards (*Grazing and Timber Integration Manual*, page 13). These cutblocks would contribute to the net available grazing in subsequent 10-yr sequences.

Therefore the amount of excluded net grazing due to timber harvest:

- fluctuates between the six 10-yr sequences within each FMU (Tables 5 - 12);
- is an estimate of the impact of timber harvesting on grazing potential that was developed to ensure that the resulting SRCC was as conservative as possible; and,
- is an estimate to be used for planning purposes only. Detailed information regarding how the 10-yr sequences were developed can be found in Appendix 3.

Although the existing and planned cutblocks were removed from available net grazing in this landscape analysis to determine SRCC, this does not necessarily preclude livestock grazing in cutblocks. The ability to graze existing or planned cutblocks will be determined through the development of a Grazing Timber Agreement (*Grazing and Timber Integration Manual*, page 13).

Sustainable Regional Carrying Capacity

Available net grazing is the estimated amount of grazing available after timber harvesting is accounted for. The sustainable regional carrying capacity (SRCC) is the least amount of grazing that can be integrated into each FMU over the six 10-year sequences and is equal to the lowest net available grazing (Tables 5 - 12).

Due to the scattered nature of the gross grazing potential and the impact of timber harvesting, the net available grazing for each FMU is highly fragmented (Appendices 5-13). Therefore the net available grazing was further defined using a subjective estimate of fragmentation. This calculation provided an estimate of the amount of available net grazing that exists in relatively large (> 1 section), contiguous patches. An example of how the fragmentation calculation was determined for each FMU is provided in Appendix 3.

Available net grazing with current operating standards is an estimate of the amount of grazing that is contiguous grazing that could be allocated and managed with typical operating standards such as rotational grazing. Available net grazing with intensive operating standards is an estimate of grazing that is less contiguous (scattered and fragmented) where more intensive management and planning between the grazing and timber industries would be required (Tables 5 - 12).

Application of the SRCC

The SRCC provides an estimate of the grazing and timber integration potential within the FMU and RGP. The SRCC represents the least amount of grazing that can likely be integrated into an FMU and therefore helps create reasonable expectations for both industries. The SRCC was developed in such a way that is should not be considered a "target" or "ceiling" for grazing within each FMU. Nor should the SRCC be used to replace carrying capacities developed from detailed inventory for grazing dispositions.

SRCC are estimates that should be used as a guideline for planning purposes only, because the SRCC:

- Was developed through landscape analysis (scale of 1:200,000)
- Was based on current AVI information and estimated stocking rates
- Was combined with spatial timber harvest sequencing that is subject to change
- Included environmental exclusions such as anthropogenic vegetation (well sites and pipelines) and riparian areas (100 m and 60 m buffers) that may be deemed suitable for grazing under a grazing management plan at the disposition level
- Does not include grazing potential from existing or planned cutblocks that could be grazed depending on range management planning and GTA negotiations
- Included timber harvest fragmentation net down which may underestimate grazing that could be achieved with intensive operating standards.

Table 4. Summary of the Sustainable Regional Carrying Capacity (SRCC) determined for each FMU within the Whitecourt-Edson RGP

FMA	FMU	SRCC (AUM)	Available Net Grazing with Current Operating Standards (AUM)	Available Net Grazing with Intensive Operating Standards (AUM)
Millar Western Forest Products	W11	3 881	776	3 105
	W13	6 851	1 576	5 275
Blue Ridge Lumber	W14*	7 434	NA	NA
Weyerhaeuser - Edson	W5	1 809	362	1 447
	W6	13 629	2 453	11 175
	E1	1 852**	0	0
	E2	2 859	314	2 554
Sundance Forest Products	R13*	1 486**	0	0
Hinton Wood Products	E3*	5 245	NA	NA
None	S7*	552	NA	NA
None	S01*	52	NA	NA
None	W01*	6 433	NA	NA
None	W02*	1 889	NA	NA
None	E01*	2 964	NA	NA
RGP TOTAL		**57 027**		

*No spatial timber harvest sequencing available therefore SRCC represents current regional carrying capacity rather than a 60-year sustainable regional carrying capacity.

**Available net grazing within this FMU consists of small, scattered and fragmented patches insufficient to support grazing dispositions.

Table 5. Summary of Sustainable Regional Carrying Capacity (SRCC) Analysis for FMU W6

	1st 10 year sequence	2nd 10 year sequence	3rd 10 year sequence	4th 10 year sequence	5th 10 year sequence	6th 10 year sequence
Total Area (ha)	187 537	187 537	187 537	187 537	187 537	187 537
Administrative Exclusions (ha)	4 770	4 770	4 770	4 770	4 770	4 770
Environmental Exclusions (ha)	6 744	6 744	6 744	6 744	6 744	6 744
Nonuse Grazing Potential (ha)	137 343	137 343	137 343	137 343	137 343	137 343
Excluded Net Grazing Due to Timber Harvest (ha)	11 835	11 594	10 826	10 436	9 869	9 146
Available Net Grazing (ha)	26 845	27 086	27 854	28 244	28 811	29 534
Available Net Grazing (AUMs)	**13 629**	14 582	14 857	14 998	15 189	15 420
Available Grazing with Current Operating Standards (AUMs) (18% of Available Net Grazing)	**2 453**	2 625	2 674	2 700	2 734	2 776
Available Grazing with Intensive Operating Standards (AUMs) (82% of Available Net Grazing)	**11 175**	11 957	12 183	12 298	12 455	12 645

Sustainable Regional Carrying Capacity for FMU W6 = 13 629 AUM

Table 6. Summary of Sustainable Regional Carrying Capacity (SRCC) Analysis for FMU W5

	1st 10 year sequence	2nd 10 year sequence	3rd 10 year sequence	4th 10 year sequence	5th 10 year sequence	6th 10 year sequence
Total Area (ha)	71 458	71 458	71 458	71 458	71 458	71 458
Administrative Exclusions (ha)	15 603	15 603	15 603	15 603	15 603	15 603
Environmental Exclusions (ha)	2 450	2 450	2 450	2 450	2 450	2 450
Nonuse Grazing Potential (ha)	46 497	46 497	46 497	46 497	46 497	46 497
Excluded Net Grazing Due to Timber Harvest (ha)	3 726	3 796	4 104	3 586	3 251	2 683
Available Net Grazing (ha)	3 182	3 112	2 804	3 322	3 657	4 225
Available Net Grazing (AUMs)	**1 809**	2 139	2 014	2 211	2 313	2 537
Available Grazing with Current Operating Standards (AUMs) (20% of Available Net Grazing)	**362**	428	403	442	463	507
Available Grazing with Intensive Operating Standards (AUMs) (80% of Available Net Grazing)	**1 447**	1 711	1 612	1 768	1 850	2 030

Sustainable Regional Carrying Capacity for FMU W5 = 1 809 AUM

Table 7. Summary of Sustainable Regional Carrying Capacity (SRCC) Analysis for FMU E1

	1st 10 year sequence	2nd 10 year sequence	3rd 10 year sequence	4th 10 year sequence	5th 10 year sequence	6th 10 year sequence
Total Area (ha)	32 302	32 302	32 302	32 302	32 302	32 302
Administrative Exclusions (ha)	2 007	2 007	2 007	2 007	2 007	2 007
Environmental Exclusions (ha)	743	743	743	743	743	743
Nonuse Grazing Potential (ha)	25 246	25 246	25 246	25 246	25 246	25 246
Excluded Net Grazing Due to Timber Harvest (ha)	337	388	356	514	1 115	1 257
Available Net Grazing (ha)	3 969	3 918	3 950	3 792	3 191	3 049
Available Net Grazing (AUMs)	2 320	2 299	2 312	2 231	1 939	**1 852**
Available Grazing with Current Operating Standards (AUMs) (0% of Available Net Grazing)	0*	0	0	0	0	**0**
Available Grazing with Intensive Operating Standards (AUMs) (0% of Available Net Grazing)	0*	0	0	0	0	**0**

Sustainable Regional Carrying Capacity for FMU E1 = 1 852 AUM
*Available Net Grazing within FMU E1 consists of small, scattered and fragmented patches insufficient to support grazing dispositions.

Table 8. Summary Sustainable Regional Carrying Capacity (SRCC) Analysis for FMU E2

	1st 10 year sequence	2nd 10 year sequence	3rd 10 year sequence	4th 10 year sequence	5th 10 year sequence	6th 10 year sequence
Total Area (ha)	98 068	98 068	98 068	98 068	98 068	98 068
Administrative Exclusions (ha)	23 475	23 475	23 475	23 475	23 475	23 475
Environmental Exclusions (ha)	2 255	2 255	2 255	2 255	2 255	2 255
Nonuse Grazing Potential (ha)	61 642	61 642	61 642	61 642	61 642	61 642
Excluded Net Grazing Due to Timber Harvest (ha)	4 619	4 017	4 218	4 537	5 668	4 867
Available Net Grazing (ha)	6 077	6 679	6 478	6 159	5 028	5 829
Available Net Grazing (AUMs)	2 859	3 263	3 267	3 145	**2 694**	3 016
Available Grazing with Current Operating Standards (AUMs) (11% of Available Net Grazing)	314	359	359	346	**296**	332
Available Grazing with Intensive Operating Standards (AUMs) (89% of Available Net Grazing)	2 544	2 904	2 907	2 799	**2 397**	2 684

Sustainable Regional Carrying Capacity for FMU E2 = 2 694 AUM

Table 9. Summary of Sustainable Regional Carrying Capacity (SRCC) Analysis for FMU W11

	1st 10 year sequence	2nd 10 year sequence	3rd 10 year sequence	4th 10 year sequence	5th 10 year sequence	6th 10 year sequence
Total Area (ha)	73 657	73 657	73 657	73 657	73 657	73 657
Administrative Exclusions (ha)	6 295	6 295	6 295	6 295	6 295	6 295
Environmental Exclusions (ha)	2 855	2 855	2 855	2 855	2 855	2 855
Nonuse Grazing Potential (ha)	47 599	47 599	47 599	47 599	47 599	47 599
Excluded Net Grazing Due to Timber Harvest (ha)	3 915	7 224	6 335	4 653	4 030	2 999
Available Net Grazing (ha)	12 993	9 684	10 573	12 255	12 878	13 909
Available Net Grazing (AUMs)	4 903	**3 881**	4 271	4 735	4 918	5 250
Available Grazing with Current Operating Standards (AUMs) (20% of Available Net Grazing)	981	**776**	854	947	984	1 050
Available Grazing with Intensive Operating Standards (AUMs) (80% of Available Net Grazing)	3 922	**3 105**	3 417	3 788	3 934	4 200

Sustainable Regional Carrying Capacity for FMU W11 = 3 881 AUM

Table 10. Summary of Sustainable Regional Carrying Capacity (SRCC) Analysis for FMU W13

	1st 10 year sequence	2nd 10 year sequence	3rd 10 year sequence	4th 10 year sequence	5th 10 year sequence	6th 10 year sequence
Total Area (ha)	92 916	92 916	92 916	92 916	92 916	92 916
Administrative Exclusions (ha)	19 378	19 378	19 378	19 378	19 378	19 378
Environmental Exclusions (ha)	1 514	1 514	1 514	1 514	1 514	1 514
Nonuse Grazing Potential (ha)	45 255	45 255	45 255	45 255	45 255	45 255
Excluded Net Grazing Due to Timber Harvest (ha)	6 620	10 557	9 082	8 389	8 163	5 498
Available Net Grazing (ha)	20 149	16 212	17 687	18 380	18 606	21 271
Available Net Grazing (AUMs)	8 333	**6 851**	7 389	7 629	7 672	8 683
Available Grazing with Current Operating Standards (AUMs) (23% of Available Net Grazing)	1 917	**1 576**	1 699	1 755	1 765	1 997
Available Grazing with Intensive Operating Standards (AUMs) (77% of Available Net Grazing)	6 416	**5 275**	5 690	5 875	5 908	6 686

Sustainable Regional Carrying Capacity for FMU W13 = 6 851 AUM

Table 11. Summary of Sustainable Regional Carrying Capacity (SRCC) Analysis for FMU R13

	1st 10 year sequence	2nd 10 year sequence	3rd 10 year sequence	4th 10 year sequence	5th 10 year sequence	6th 10 year sequence
Total Area (ha)	32 435	32 435	32 435	32 435	32 435	32 435
Administrative Exclusions (ha)	2 380	2 380	2 380	2 380	2 380	2 380
Environmental Exclusions (ha)	1 096	1 096	1 096	1 096	1 096	1 096
Nonuse Grazing Potential (ha)	24 560	24 560	24 560	24 560	24 560	24 560
Excluded Net Grazing Due to Timber Harvest (ha)*	1 057	1 420	-	-	-	-
Available Net Grazing (ha)	3 342	2 979	4 399	22 007	40 974	4 399
Available Net Grazing (AUMs)	1 577	**1 486**	2 048	6 048	11 202	2 048
Available Grazing with Current Operating Standards (AUMs) (0% of Available Net Grazing)	0	**0***	NA	NA	NA	NA
Available Grazing with Intensive Operating Standards (AUMs) (0% of Available Net Grazing)	0	**0***	NA	NA	NA	NA

Sustainable Regional Carrying Capacity for FMU R13 = 1 486 AUM, however spatial harvest sequence data was available for 1st and 2nd 10-yr sequence only. Therefore, SRCC represents current grazing rather than SRCC determined for FMU with spatial harvest sequencing for six 10-yr sequences.

*Available Net Grazing within FMU R13 consists of small, scattered and fragmented patches insufficient to support grazing dispositions.

Table 12. Summary of analysis to estimate current available net grazing (AUM) for FMUs with limited or no spatial harvest sequence data

FMU	W14*	E3*	W01	E01	S01	W02	S7
Total Area (ha)	58 518	54 015	165 122	109 849	8 474	195 133	20 144
Administrative Exclusions (ha)	3 028	2 966	59 847	36 644	1 796	76 752	2 418
Environmental Exclusions (ha)	1 597	454	1 698	1 061	43	1 105	124
Nonuse Grazing Potential (ha)	36 024	39 141	88 974	47 617	6 575	112 162	16 401
Excluded Net Grazing Due to Timber Harvest (ha)	293	813					
Available Net Grazing (ha)	18 576	10 659	17 142	4 527	90	5 114	1 201
Available Net Grazing (AUMs)	7 434	5 245	6 433	2 964	52	1 889	552
Available Grazing with Current Operating Standards (AUMs)**	3 197	1 941	NA	NA	NA	NA	NA
Available Grazing with Intensive Operating Standards (AUMs) ***	4 237	3 305	NA	NA	NA	NA	NA

*Spatial harvest sequence data available for 1st 10-yr sequence only, therefore Available Net Grazing represents current grazing and SRCC could not be determined.

**Available grazing with Current Operating Standards in FMU W14 based on 43% of Available Net Grazing and % in E3.

***Available grazing with Intensive Operating Standards in FMU W14 based on 57% of Available Net Grazing and % in E3.

Note: Spatial harvest sequencing was available for FMU W01, E01, S01, W02 and S7; therefore available net grazing does not account for any timber harvesting and SRCC could not be determined.

Forecast of Harvest Impact on Existing Green Area Grazing Dispositions

The *Grazing and Timber Integration Manual* (SRD, June 2006) recognizes that one of the "major outcomes of developing a RGP would include a strategy to guide allocation of grazing dispositions in the planning area that addresses the grazing disposition holders' interest prior to new allocation."

An analysis of the timber harvesting impact on each individual grazing disposition was completed in order to:

- help develop management strategies for the allocation of the SRCC;
- provide information to existing grazing disposition holders to assist their management planning and GTA negotiations with the timber industry; and,
- provide information to timber companies for consideration in their DFMP so that impact on grazing dispositions can be minimized.

There are 561 grazing dispositions within the RGP area. Of these, 168 grazing dispositions are in the Green Area and are, or will be, impacted by timber harvesting (Table 19; Table 3.10a and 3.10b in Appendix 2). The impact of timber harvesting varies over time. It should be noted that:

- present day AUM and impact are estimates derived from the RGP map and do not reflect the carrying capacities listed on grazing records;
- timber harvest impact was estimated from spatial harvest sequence which is subject to change and does not necessarily reflect the exact size and location of the cutblock; and,
- timber harvest impact across the six 10-yr sequences is not necessarily accumulative because cutblocks come back into grazing potential after 14 years.

In all FMUs the amount of grazing from contiguous areas (SRCC using current operating standards) is much less than fragmented grazing (SRCC using intensive operating standards). Therefore alternative grazing that could be accessed to help mitigate the timber harvesting impact will likely be derived from fragmented landscape using intensive operating standards.

Table 13. Estimated Impact of Timber Harvesting (AUM) on existing Green Area Dispositions and the Estimated SRCC for each 10-yr Sequence and each FMU

FMU	Sustainable Regional Carrying Capacity*		Timber Harvesting Impact within each 10-Yr Sequence**					
	Current Operating Standards (AUM)	Intensive Operating Standards (AUM)	1st Impact (AUM)	2nd Impact (AUM)	3rd Impact (AUM)	4th Impact (AUM)	5th Impact (AUM)	6th Impact (AUM)
W6	2 453	11 175	1 154	552	299	266	54	67
W5	362	1 447	1 121	1 019	1 120	949	813	801
E1	0	0	0	0	0	0	0	0
E2	314	2 544	945	1 000	1 242	1 182	1 124	865
W11	981	3 922	163	475	34	113	91	90
W13	1 917	6 416	230	1 037	1 053	806	808	581
W14	3 197	4 237	0	0	0	0	0	0
E3	1 941	3 305	0	0	0	0	0	0
R13*	0	0	0	0	0	0	0	0

*SRCC = net available grazing; see Tables 5 - 12.
**impact is not necessarily cumulative over time therefore columns should not be added
Note: Detailed analysis of timber harvesting impact on each existing Green Area disposition can be found in Tables 3.10a and 3.10b in Appendix 3.
Note: FMU W01, W02, E01, S01, S7 do not have spatial harvest sequence and therefore no estimate of timber harvest impact.

ALLOCATION AND MANAGEMENT STRATEGIES

Within the RGP area management, strategies to aid integration of grazing and timber and strategies for allocating grazing were devised based on the outcomes of the SRCC analysis. The allocation management strategies considered the amount and distribution of allocated and available AUMs, the structure of the local grazing community (i.e. small independent grazing allocations, organized associations), current timber commitments, existing plans and policies, economics and the amount of current and potential integration issues.

A number of management strategy options were considered during the development of the RGP. These options considered the direction contained in the *Grazing and Timber Integration Manual & Directive for Integration of Grazing and Timber Activities (June 2006)* and that provided by the Regional Grazing Timber Advisory Committee (RGTAC). The preferred management strategies were the end result of an interactive process of analyses and discussions with the RGTAC and the Branch Directors involved in plan approval.

Allocation Priorities

The *Grazing and Timber Integration Manual* (SRD, 2006) outlined grazing allocation priorities, which include:

1. Suitable and available vacant White Area land;
2. Suitable and available White Area land designated for sustained timber yield;

3. Suitable and available Green Area land with no planned timber harvest in the term of the proposed grazing disposition, and cutblocks that have met the applicable regeneration standard; and,
4. Suitable and available Green Area land with timber harvest plans or regenerating cutblocks, but where grazing can be accommodated. The 4th priority was further prioritized into:
    i. Future allocations include enough range to avoid use of regenerating cutblocks;
    ii. Existing allocations should be reviewed for expansion or relocation to compensate for lost range and avoid the need to graze within regenerating cutblocks, and;
    iii. If unavoidable, regenerating cutblocks can be included for grazing as long as the two parties agree to it and a Grazing Timber Agreement (GTA) is developed.

Based on the results of the SRCC analysis these allocation priorities cannot be followed for the Whitecourt-Edson RGP, because:

1. There is minimal vacant White Area crown land with or without sustained timber harvest, and;
2. It is also impractical to separate priority 3 and 4 lands.

Allocation Process

A key principle developed in the RGP acknowledges that the interests of existing disposition holders will be addressed prior to new grazing allocations. To help ensure that existing grazing disposition holders' interests will be considered, a modified Land Disposition Request (LDR) process for new grazing dispositions would be applied.

The modified LDR process would apply to the Green Area within the RGP and would be implemented as follows:

a. Existing grazing applications (LDR) in the project area will be cancelled. This will allow the greatest opportunity for existing grazing disposition holders to identify areas of potential interest.

b. All existing grazing disposition holders within the RGP boundary will be given information on the potential timber harvest impact to the area they hold under disposition. In particular, they will receive detailed decade by decade data on how their dispositions may be affected. Data for future planned operations after the first decade should be carefully interpreted. This information is subject to change due to numerous factors including fire, pine beetle and adjustments for other industrial activity on the forest management land base.

c. Expressions of interest for new grazing opportunity will only be accepted from existing disposition holders in the project area for the first six months following plan approval. This will allow those producers to identify the most suitable lands to help mitigate current and future timber harvest impact. Any areas deemed suitable for grazing disposition will be issued under grazing licence on a competitive basis (tender or auction).

d. After the six month period, applications will be accepted from anyone interested in grazing in the plan area. The area that is applied for should be sufficient to meet long term carrying capacity needs considering future timber harvest plans for the area.

Land Disposition Request (LDR) applications for grazing must follow the process outlined in Appendix 2 of the *Grazing and Timber Integration Manual*. Grazing Timber Agreements will be required on those lands where grazing and timber harvest operations are planned within the term of the grazing disposition.

It is recommended that applicants review the Whitecourt-Edson RGP and *Grazing and Timber Integration Manual*, and discuss their plans with the local Rangeland Agrologist before submitting any application for new grazing.

Disposition Types

Grazing on Green Area and White Area land designated for sustained timber yield, will be allocated using Forest Grazing Licences (FGL). The *Grazing and Timber Integration Manual* (SRD, June 2006) outlined two options for the allocation of available AUMs:

1) fixed grazing disposition, and
2) roving grazing disposition.

Fixed Grazing Dispositions
Fixed grazing dispositions would be large enough to integrate timber and grazing over the term of the disposition by separating them spatially within the disposition. The carrying capacity would be at the lowest level based on the total amount of timber harvest and reforestation activity. During those times when timber harvest and reforestation interests do not occur on the area, additional AUMs can be captured on a temporary basis.

Grazing Associations - Allocating a large fixed disposition to a grazing association would allow them the ability to manage the integration of timber harvesting and grazing. Conceptually, the association would be responsible for determining membership and allocation of available grazing opportunity. While there are benefits in terms of pooling resources incurred for managing large tracts of land, this option may limit the ability of an individual to manage independently, including concerns about mixing herds and disease transmission. Very large tracts of land would be required to support several association members with unimproved forest grazing. Large areas of contiguous grazing do not occur within the RGP. Therefore lands managed by grazing associations would be highly fragmented by timber harvesting activity and would require intensive management.

Roving Grazing Dispositions
The roving grazing disposition option involves adjustment or relocation of the disposition after a set period of time and before timber harvesting occurs. This option can be considered where there is a need to avoid overlapping grazing with reforesting cutblocks.

Head Tax Permits - Current policy allows for the issuance of individual, annual head tax permits up to 200 AUMs on a priority basis. Head tax permits could assist existing disposition holders access short term grazing to help offset losses due to timber harvest activity.

Preferred Grazing Allocation Method

The preferred grazing allocation method that has been selected for the RGP area is most closely linked to the fixed grazing disposition option described above. It would allow existing and new applicants for grazing to be aware of current and future timber impacts on available grazing prior to application. It also ensures that before any new grazing allocations are made, existing grazing disposition holders' interests will be considered. For those Green Area RGP sub-units that are managed for sustained timber production, a modified Land Disposition Request (LDR) process for new grazing will be applied. This modified LDR process would allow existing grazing disposition holders within these RGP sub-units to apply first for land that they may wish to obtain for additional grazing. This process would still allocate grazing rights based on a competitive auction process.

For the White Area public land contained in the RGP, existing grazing disposition holders may have the option to undertake improved grazing to offset timber impacts. The modified LDR process will not apply and the interested applicants can apply at any time for grazing on available and suitable land in the White Area.

Management Strategies

Grazing-Timber Integration

1. Forest information such as forest vegetation inventory and proposed and existing cutovers is to be provided to the grazing disposition holder if requested, to assist in their operational planning for integration.
2. FMA holders are to involve the grazing community in development of the Detailed Forest Management Plans as well as in the General Development Plans. All other forest companies (Quota, Deciduous Timber Allocation, and Community Timber Program) are expected to seek out affected grazing disposition holders in the preparation of Annual Operating Plans. The Regional Grazing Timber Advisory Committee is expected to help facilitate this consultation process.
3. New applications for grazing will be referred to the FMA holder by SRD for their review and comments.
4. Where Resource Management Operational Plans (RMOP) exists for a grazing disposition holder, it is expected that these be shared with the forest company so that respective operations can be better aligned.
5. Applications for grazing outside the RGP in the Woodlands and Foothills SRD Areas will not generally be considered until suitable grazing potential has been allocated from within the RGP. Guidelines within the *Grazing and Timber Integration Manual (SRD, June 2006)* will apply to grazing dispositions in the Woodlands and Foothills SRD administrative areas outside the Whitecourt-Edson RGP area.

Fish and Wildlife Resources

1. Identified habitat for threatened Trumpeter Swans and Caribou will be excluded from consideration for grazing. The habitat zones for these threatened species have been accounted for in the determination of net grazing potential. The habitat zones can be found in *Wildlife Guidelines for Land Use Activities in Areas 3 and 4 of the Southwest Region – September 15, 2005.*
2. The wildlife guidelines documented above will be reviewed and amended to include land use conditions for grazing within wildlife zones.
3. Rare plants will be identified and protected on the landscape through the use of the rare plant database and grazing/timber management planning.

FMU Specific Management Strategies

White Area RGP Sub-Unit (FMUs E01, S01, W01, W02)

White Area public land contained in this RGP sub-unit was identified as to what was currently available for new grazing allocation as well as what land was being maintained for sustained timber production. The *Cold Creek Regional Integrated Decision* as well as the *Whitecourt Anselmo Public Land Use Strategy* identified those lands that were to be managed for sustained yield timber. Both documents also allowed for up to 40% of suitable land on the grazing disposition on sustained yield timber land to be converted to improved grazing as a means to integrate timber and grazing.

White Area public land suitable and available for grazing was identified as the highest priority for allocation in the *Grazing and Timber Integration Manual (SRD, June 2006).* However, due to the scattered nature of the identified available land and the patchy nature of the range potential, there is limited opportunity for new grazing.

Green Area Sub-Unit (FMUs E1, E2, E3, W5, W6, W11, W13, W14, R13, S7)
The net available grazing within the Green Area sub-unit is mostly scattered and fragmented and would require intensive operating standards to access areas with suitable grazing. The following management strategies for each FMU in the Green Area are recommended:

- FMUs E1 and E2 do not have sufficient net available grazing to support new grazing dispositions.
- The small amount of net available grazing with W5, R13, E3, W14, S7 will likely be insufficient to offset the potential timber harvesting impact on existing grazing dispositions or to support new grazing allocations.
- The scattered and fragmented nature of the net available grazing within FMUs W6, W11 and W13 is best suited to allocation with large fixed grazing dispositions so that the grazing and timber industries have sufficient area to operate together within the same disposition.

Table 14 - Action Plan and detailed table describing the goals, objectives, targets, indicators for the Whitecourt-Edson RGP.

GOAL: ***A characteristic or quality considered to be important***
1. Sustainability – Grazing timber will be integrated to ensure that there is sustainable forage and fibre on public lands managed for sustainable timber production.

OBJECTIVE: *A broad statement describing a desired future condition for a value*
1. A sustainable level of grazing will be estimated and maintained for the RGP area.

Indicators *Measurable component of a resource value*	**Targets** *Specifies the desired conditions, state or range for the indicator*	**Means of Achieving Objective**	**Monitoring and Measurement**	**Reporting**
Develop Sustainable Regional carrying capacities (SRCC) that consider net available landbase, spatial distribution and amount of grazing potential, and impacts of timber harvest over time.	Allocations of new grazing will consider the grazing potential and SRCC (where available) and as described in the RGP. Range health is maintained on grazing dispositions. Within areas managed for grazing, long term forage production is not impaired as a result of timber harvesting.	Regular plan review to assess changes to landbase, vegetation and harvest sequencing will be required. Comparisons of amount of grazing allocated to estimated potential will be required. Impact to carrying capacities on grazing dispositions from timber activities within sustained timber yield areas will be minimized through the GTA process. The GTA is completed by the timber and the grazing operators and approved by SRD.	The Regional Grazing Plan will be reviewed every 10 years, or as necessary, by the Foothills and Woodlands Areas. Allocation of grazing and estimated potential will be reviewed annually. Applications will be dealt with within one year. Monitoring will be undertaken as per the GTA procedures as described in the *Grazing and Timber Integration Manual*.	Results of a review of the RGP will be conveyed to the Regional Grazing Timber Integration Committee and to the Directors of Rangeland Management and Forest Management.

OBJECTIVE: *A broad statement describing a desired future condition for a value*
2. A sustainable level of timber will be estimated and maintained for those portions of the RGP managed for sustained timber management.

Indicators *Measurable component of a resource value*	Targets *Specifies the desired conditions, state or range for the indicator*	Means of Achieving Objective	Monitoring and Measurement	Reporting
For sustained yield timber areas, an annual allowable cut is determined that considers the range resource and its utilization within the forest management unit Amount of forested land remaining in productive forested state for timber productions within a sustained yield forest management unit.	Within areas managed for sustained yield timber, timber production is not impaired as a result of grazing. Regeneration will not be damaged by domestic stock grazing to the point where the overall stocking is reduced below the reforestation standard.	Detailed forest management plans have considered the range resource and the input from the grazing community into determination of an annual allowable cut. A Grazing Timber Agreement is developed between the timber and grazing operator which ensure grazing does not affect the reforestation standard from being achieved.	Forest management plans have considered grazing into their VOIT development, public communications and operating guidelines. Regeneration surveys undertaken. Monitoring will be undertaken as per the GTA procedures as described in the *Grazing and Timber Integration Manual*	Results of integration efforts will be conveyed within the Regional Grazing Timber Integration Committee meetings and to the Directors of Rangeland Management and Forest Management.

GOAL: ***A characteristic or quality considered to be important***

2. Greater collaboration amongst all parties.

OBJECTIVE: *A broad statement describing a desired future condition for a value*

1. The grazing and timber industries along with Government will work together to ensure integration of range and timber resource use.

Indicators *Measurable component of a resource value*	Targets *Specifies the desired conditions, state or range for the indicator*	Means of Achieving Objective	Monitoring and Measurement	Reporting
For sustained yield timber areas, an annual allowable cut is determined that considers the range resource and its utilization within the forest management unit Amount of forested land remaining in productive forested state for timber productions within a sustained yield forest management unit.	Within areas managed for sustained yield timber, timber production is not impaired as a result of grazing. Regeneration will not be damaged by domestic stock grazing to the point where the overall stocking is reduced below the reforestation standard.	Detailed forest management plans have considered the range resource and the input from the grazing community into determination of an annual allowable cut. A Grazing Timber Agreement is developed between the timber and grazing operator which ensure grazing does not affect the reforestation standard from being achieved.	Forest management plans have considered grazing into their VOIT development, public communications and operating guidelines. Regeneration surveys undertaken. Monitoring will be undertaken as per the GTA procedures as described in the *Grazing and Timber Integration Manual*	Results of integration efforts will be conveyed within the Regional Grazing Timber Integration Committee meetings and to the Directors of Rangeland Management and Forest Management.
Grazing and timber integration issues will be addressed.	Information exchange occurs amongst all parties GTA is to be agreed to by both parties and endorsed by SRD. Improvements to the plans and operating guidelines to integrate grazing and timber occurs	Timber and grazing operators, as well as government provide the necessary info, including respective operating plans, to allow for effective integration. The Regional Grazing Timber Integration Committee provides advice to Government on matters affecting integration of grazing and timber.	The Grazing Timber Integration Advisory Committee will provide advice to Government on matters of integration as well as education and awareness.	Results of integration efforts will be conveyed within the Regional Grazing Timber Integration Committee meetings and to the Directors of Rangeland Management and Forest Management.

GOAL: *A characteristic or quality considered to be important*

3. Existing grazing disposition holders interests will be addressed

OBJECTIVE: *A broad statement describing a desired future condition for a value*

1. Prior to new allocations for grazing, existing grazing disposition interests will be addressed.

Indicators *Measurable component of a resource value*	**Targets** *Specifies the desired conditions, state or range for the indicator*	**Means of Achieving Objective**	**Monitoring and Measurement**	**Reporting**
Impact of timber harvest on existing grazing dispositions will be estimated and communicated to the disposition holder.	All existing grazing disposition holders will be aware of potential impacts to their grazing from proposed timber harvest and reforestation where the spatial harvest sequence information exists. All existing disposition holders will have the opportunity to apply for additional grazing.	A modified LDR process will be considered for Green Area applications that will give priority to existing disposition holders to apply for new grazing. In the White Area, some opportunities may exist for improved grazing to offset impacts of timber harvesting. Temporary authorizations will be considered where appropriate.		

GOAL: *A characteristic or quality considered to be important*

4. Landscape level biodiversity is conserved.

OBJECTIVE: *A broad statement describing a desired future condition for a value*

1. Maintain habitat for all naturally occurring species (plants and animals) within the planning area

Indicators *Measurable component of a resource value*	**Targets** *Specifies the desired conditions, state or range for the indicator*	**Means of Achieving Objective**	**Monitoring and Measurement**	**Reporting**
Range health is maintained. Permanent clearing for range improvements will be minimized	Landscape targets for habitat are maintained for the Green Area portion of the RGP. Improved grazing would not exceed 40% of suitable land on a grazing disposition from White Area designated for sustained timber yield.	Threatened species such as trumpeter swan and caribou will have their identified habitats excluded from grazing and timber. Rare plants have been recognized and protected. Unique and uncommon plant communities, identified through forest management plans, will be considered in the allocation and management of the range resource. Operating guidelines will be developed for grazing within identified wildlife zones. Timber and grazing operations will follow grazing and timber integration operating standards described in section 5 of the Grazing Timber Integration Manual (June 2006). Improved grazing may be allowed on White Area grazing dispositions. On Green Area grazing dispositions, existing approved development will be maintained.	No new grazing or timber allocations will be issued within areas identified as trumpeter swan and caribou habitats. Rare plant data set is used in land use decision making for new allocations and operation approvals. Existing wildlife guideline for land use activities in Areas 3 and 4 of Southwest Region will be updated to include grazing operating conditions. Range health assessments will be completed. The necessary approvals from SRD are obtained before permanent clearings are developed.	

IMPLEMENTATION

Communication

Once the Regional Grazing Plan has received approval from the Directors of the Rangeland Management and Forest Management Branches, the following communication actions will be implemented.

- The Regional Grazing Plan will be placed on the external SRD website and will also be available at the Barrhead, Whitecourt and Edson SRD offices.
- Letters will be sent to current grazing disposition holders whose dispositions are contained within the boundaries of the Regional Grazing Plan explaining the intent and direction of the plan. The letter will contain directions on where the plan can be obtained, how new grazing allocations will be issued as well as how to contact Government staff and the Regional Grazing Timber Advisory Committee.
- Forest companies with allocations within the plan boundary will also be sent notification letters regarding the plan with similar information as given to the current grazing disposition holders.
- Government staff involved in administering the Regional Grazing Plan will be made aware of the plan and its contents along with specific details on implementing the management actions prescribed in the plan.

Decision Making

The Government agrologist will determine appropriateness of any new grazing application and is to be consulted by the applicant. The Regional Grazing Plan is intended to assist the applicant and the agrologist in determining appropriate areas for which timber and grazing can best be integrated and how that might occur. Referral of new applications to the respective forest company will also be undertaken.

Any significant alteration of the Regional Grazing Plan such as, but not limited to, changes to planning area boundary, resource management objectives and management strategies will require the approval of the Directors of the Range Management and Forest Management Branches.

Monitoring, Review and Amendment

Monitoring and Review – The Regional Grazing Plan will be reviewed every 10 years, or as necessary, by the Foothills and Woodlands Areas and results conveyed to the Regional Grazing Timber Integration Advisory Committee and the Directors. The review will:

- Assess the success in achieving the intent and objectives in the plan with the resource management actions prescribed in the plan and the operating standards contained in the *Grazing and Timber Integration Manual.*
- Recommend amendments to the plan and future actions required to maintain resource management activities in the planning area.

Amendment – An amendment to the plan may be required as a result of a regular review and/or from a significant change to the available natural resource information, boundaries or objectives for the planning area. New information may come from monitoring or research initiatives which may result in a review of the plan and possible amendments.

Changes in Forest Management Plans and their proposed harvest sequencing may be significant enough to prompt an amendment to the Regional Grazing Plan. Where this occurs, a joint discussion between

industries and SRD will occur to determine the impact on the regional grazing plan and what changes would be required.

Proposed amendments will require the endorsement of the Directors of the Range Management and Forest Management Branches. Advice from the Regional Grazing Timber Integration Advisory Committee will be solicited as well.

Linkage to Operational Level

Monitoring the operational results as described below creates the linkage back to this plan. This is important for performance assessment and to allow for adaptive management when objectives are not being met.

Operating Standards – In addition to the operating standards described in section 5.0 of the *Grazing and Timber Integration Manual,* wildlife guidelines will be developed and applied for grazing within the Foothills and Woodlands Areas. The Manual describes the requirement for a grazing timber agreement that is agreed to between the grazing disposition holder and the forest company in implementing each others operations in an integrated fashion.

Timber harvest planning and operating ground rules are prepared for each forest management agreement area and outline how forest planning and operations will be conducted with due consideration to other resource values and users. These ground rules will consider the direction provided in the regional grazing plan and the *Grazing and Timber Integration Manual*.

Available Resource Information – To assist the grazing disposition holder in their planning for integration, necessary resource information will be made available to them by Government and forest companies. The Regional Grazing Timber Integration Advisory Committee is a proponent of having greater sharing of natural resource information to facilitate integration of operational plans.

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APPENDIX 1:
Detailed Description of the Whitecourt-Edson RGP Area

Administrative Boundaries

Green/White Areas

All land in Alberta belongs to either the Green (forested) Area or the White (settled) Area (Fig.1). These broad land-use distinctions help to administrate the use of public, provincially-owned lands. The majority of northern Alberta and the mountains and foothills of western Alberta are classified as Green Area, which is managed primarily for timber production. In addition to timber production, public land here is managed for recreational use, fish and wildlife resources, and watershed protection (*Green/White Areas,* 2006). Grazing is permitted where compatible with other uses. The White Area is located in central and southern Alberta, with some land in the vicinity of Peace River. The majority of Albertans live in the White Area, where there are few parcels of public land that are not under disposition (*Green/White Areas,* 2006). Land here is primarily managed for settlement and agriculture. There are no long term timber allocations in the White Area, but permits may be granted for fixed volumes of timber.

Municipal Districts

The Regional Grazing Plan area stretches across six municipal districts, from Brazeau County to Parkland County, Yellowhead County, Woodlands County, County of Barrhead No.11, and Westlock County.

Sustainable Resource Development Boundaries

The natural resource management responsibilities of Alberta Sustainable Resource Development (SRD) are distributed among eleven SRD management areas. These defined geographic areas are managed as integrated business units for program delivery. The southern half of the Regional Grazing Plan (RGP) area is located in the Foothills management area, while the northern half reaches into Woodlands management area.

Protected Areas

There are 22 protected areas within the Regional Grazing Plan boundary: 10 Natural Areas, seven Provincial Recreation Areas, two Wildland Parks, two Provincial Parks, and one Ecological Reserve. These areas are administered under the Provincial Parks Act and the Wilderness Areas, Ecological Reserves and Natural Areas Act, which may be found online at the following website address: <http://www.qp.gov.ab.ca/index.cfm>

Forest Management Units

All forested land belongs to a Forest Management Unit (FMU). These units were designated by the Forest Management Branch in order to clearly define particular forested areas and related management decisions. The timber harvest allocations for the Forest Management Units within the grazing plan area are summarized in Appendix 3.

Forest Management Agreements

Forest Management Agreements (FMAs) allow forestry companies to harvest, remove, and grow timber on a specified area of land (*Forest Management Agreements,* 2006). There are five forestry companies

holding Forest Management Agreements in the Regional Grazing Plan area: Millar-Western Forest Products Limited, Blue Ridge Lumber Inc., Sundance Forest Industries Limited, Hinton Wood Products, and Weyerhaeuser Company Limited – Edson Division.

Wildfire Management Areas

There are 10 Wildfire Management Areas (WMAs) in Alberta which help to organize and administrate wildfire prevention and control activities. Within the RGP boundary, wildfires are managed by the Woodlands and Foothills WMAs. Each management area employs the FireSmart program, which incorporates major elements of wildfire prevention (engineering, education and enforcement) and applies them at different scales (Wildland Urban Interface, Community, or Landscape) (*Alberta Forest Management Planning Standard*, 2005). Wildland Urban Interface zones concern areas where urban developments intermingle with the forest, while the 10 km radius around a Wildland Urban Interface zone is part of the Community zone. Landscape zones consider broad-scale fire prevention – planning at this level seeks to mitigate the likelihood of large, high-intensity fires and incorporate natural disturbance emulation (*Alberta Forest Management Planning Standard*, 2005).

Physical Description

Natural Sub-regions

The Regional Grazing Plan area is occupied by four of Alberta's 20 natural subregions. These are the Dry Mixedwood, Central Mixedwood, Lower Foothills and Upper Foothills subregions. Each supports a variety of plant communities existing under similar environmental conditions (Willoughby et al. 2006).

The central and southern portions of RGP area belong to the Lower Foothills subregion, which is characterized by the codominant presence of aspen (*Populus tremulus*), lodgepole pine (*Pinus contorta*), balsam poplar (*Populus balsamifera*), white spruce (*Picea glauca*) and black spruce (*Picea mariana*) (Strong 1992). This subregion has the greatest arboreal diversity in Alberta (Strong & Leggat, 1992) and a continental climate, averaging 12.8 °C in the summer and -7.8 °C in the winter. Average annual precipitation is 464 mm (Lawrence et al. 2005), and soils are predominantly brunisols and luvisols (Beckingham et al. 1996). Topography is generally rolling, with lower elevations favouring the growth of deciduous-dominated stands, while well-drained land at higher elevations supports lodgepole pine-dominated stands. White spruce is a common secondary successor (Lawrence et al. 2005).

A small area in the far northwest reaches of the RGP boundary belongs to the Upper Foothills subregion. It is distinguished from the Lower Foothills subregion by its lack of aspen, and is dominated by closed canopy lodgepole pine forests. White spruce and black spruce are potential climax species (Beckingham et al. 1996). The climate is similar to that of the Lower Foothills, although the Upper Foothills subregion has a higher mean annual precipitation (540 mm), slightly cooler summers, and slightly warmer winters. The topography consists of "strongly rolling ridges", and brunisols and luvisols are the typical soil types found here (Beckingham et al. 1996).

The Central Mixedwood subregion runs the length of the RGP area, and encompasses much of its northern portion. Modal plant communities in this subregion are dominated by jack pine (where soils are well-drained and coarse), black spruce and willows in poorly drained areas, and aspen and balsam poplar in relatively moist areas (Willoughby et al. 2006). Annual precipitation averages 397 mm, while the mean summer temperature is 13.5 °C and the mean winter temperature is -13 °C (Willoughby et al. 2006). The topography of the Central Mixedwood subregion is relatively flat, but includes several uplands, which are dominated by deciduous forests. Soil types range from eutric brunisols and gray luvisols, to gleysols and organics (Strong and Leggat, 1992).

The south-eastern edge of the Regional Grazing Plan area belongs to the Dry Mixedwood subregion. The terrain is low and undulating, and a relatively dry climate supports formation of native grassland communities not found in the Central Mixedwood subregion (Willoughby et al. 2006). The cover type is predominantly aspen, while a variety of shrubs, grasses and herbs comprise the understory vegetation. Jack pine may be found on well-drained sites, and black spruce is common in lowland, poorly-drained areas. Annual temperatures are slightly warmer than those of the Central Mixedwood subregion, with a summer mean of 13.8 °C and a winter mean of -10.5 °C (Willoughby et al. 2006). Soil types are similar to those found in the Central Mixedwood subregion, ranging from brunisols to organics (Strong and Leggat, 1992).

Landscape Disturbance and Succession

Tree species found within the RGP area include aspen, white birch, balsam poplar, lodgepole pine, tamarack, balsam fir, white spruce, black spruce, and jack pine. See the natural subregions discussion for modal plant community distributions within the plan area.

Forest landscapes are dynamic and will change in response to disturbances and climate variations. Disturbances in Alberta's boreal forest may be the result of natural events such as disease, insects, flooding, wind, or fire caused by lightning, or they may be human-induced via timber harvesting, agriculture or industrial developments. The sequence of ecological responses which follows such a disturbance is called succession (*Forest Fires*, 2007). In the southern boreal forest of Canada, trembling aspen is the typical pioneer species following a wildfire disturbance (Wein and MacLean, as cited in *Millar Western Forest Products Ltd. Detailed Forest Management Plan: 1997-2005, 2000).* However, given significant time between disturbances, deciduous tree species will eventually be usurped by conifers.

Insect and disease infestations are among the dominant causes of natural disturbance in our forests (*Blue Ridge Lumber Inc. Detailed Forest Management Plan: Text Report, 2005*). While they are a natural part of forest ecology, insect and disease outbreaks have a substantial negative effect on timber harvest in Alberta. Blue Ridge Lumber reports, "during the period of 1988 to 1992, the average annual insect and disease loss in Alberta was 7,300,000 cubic meters, which is equivalent to 57% of the annual timber volume harvested in Alberta during the period" (*Blue Ridge Lumber Inc. Detailed Forest Management Plan: Text Report, 2005*). Insect outbreaks may be influenced by climate change (increased forest temperatures can decrease incubation periods for pest insects) (*Millar Western Forest Products Ltd. Detailed Forest Management Plan: 1997-2005, 2000)*, forest health, introduction of exotic species, or forest stand structure (degree of forest density may influence adult insect dispersal).

Forest pest insects in Alberta include the forest tent caterpillar, large aspen tortrix, spruce beetle, spruce budworm, and mountain pine beetle. The mountain pine beetle (*Dendroctonus ponderosae*) has been the cause of increasing concern since the species was first introduced to Alberta from British Columbia in the late 1990s. It is the most destructive pest of mature lodgepole pine forests in North America (*Forest Health*, 2006) and is monitored closely. Management tactics for mountain pine beetle and other destructive insects include conducting aerial and ground surveys for affected trees, restriction of potentially infected log imports, pheromone baiting, and felling/burning of infected trees. Highly destructive tree diseases are typically root or trunk rots, and have at times accounted for one-third of pest-caused timber losses (*Millar Western Forest Products Ltd. Detailed Forest Management Plan: 1997-2005, 2000).* Forest disease management tactics require educated field operators, careful harvest planning (for instance, by harvesting old timber as first priority and planning block layout to minimize blowdown), a balance of age and species classes, and consistent monitoring (*Blue Ridge Lumber Inc. Detailed Forest Management Plan: Text Report, 2005*).

Reclamation Criteria

Landscape disturbances resulting from agricultural and industrial activities are mitigated by province-wide reclamation standards. These standards ensure that reclaimed sites are returned to their original productive capabilities, and provide assessment criteria which reflect Alberta's commitment to maintaining a sustained yield of timber and forage. Traditionally, reclamation activities in the Green Area have focused on rapid vegetation growth as a means of meeting minimum vegetation cover requirements and preventing erosion. Under these conditions, reclaimed sites have typically reverted to tame grassland (to the benefit of local grazing operators). However, the Green Area reclamation criteria are currently being updated to require the presence of both herbaceous and woody plant species (distributed evenly across the site) and prohibit the growth of tame grassland (*A Guide to: Reclamation Criteria for Wellsites and Associated Facilities – 2007- Forested Lands in the Green Area Update, April,* 2007). This change will have implications for grazing integration in the Green Area.

Land Use And Natural Resources

Agriculture Resources

Farming operations are found in the White Area portion of the planning area and produce a wide variety of agricultural products including cereal grains, oilseed, forage crops and livestock. Grazing by livestock producers is the dominant agricultural use within the Green Area portion of the planning area.

Timber

The timber industry is an important source of regional economic activity. Timber harvested in the area is used to produce a variety of wood products, including lumber, oriented strandboard, wood pulp, fibreboard, firewood, and fence posts. There are numerous timber operators within the plan area – the annual allowable cuts for each are summarized in Appendix 3.

Oil and Gas

Approximately one out of every six workers in Alberta is either indirectly or directly employed by the energy sector (*Department of Energy*, 2007). The prominence of Alberta's oil and gas industry is easily felt in the RGP area, where geophysical exploration and oil and gas well drilling are common. The southern portion of the planning area reaches into the Wolf Lake oil and gas field, where there are multiple active wells, including several for coalbed methane. Alberta's deepest coal reserves are also partly within the RGP boundary – the Mannville coal formation stretches across the planning area, just south of the Athabasca Sandhills. Several coalbed methane wells are currently located here and the area will likely be subject to increased coalbed methane extraction in the future.

Road Infrastructure

Road access within the grazing plan area is dependant on three regulatory bodies. Primary and secondary highways, such as Highways 16 and 43, are managed by the Department of Infrastructure and Transportation. Back roads and all other access roads are regulated by Sustainable Resource Development (in the Green Area) or by the road authorities of individual municipal districts (in the White Area). More remote regions of the planning area may be accessed via the numerous rail-lines, utility corridors, cut lines and pipelines that support local industry.

Trapping

Fur trapping is an integral part of central Alberta's history and economy – it provides both income and recreational benefits for trappers, helps to assess furbearer populations and assists with problem animal control (*Whitecourt/Anselmo Public Land Use Strategy*, 1999). Furbearers typically found within the planning area include coyotes, lynx, fisher, marten, beaver and mink. As of 2005, there were approximately 2300 fur trappers in the province, of which roughly half conducted their trapping on one of 1700 Registered Fur Management Areas (RFMAs) (*Trapping in Alberta*, 2005).

Hunting and Fishing

Big game species such as moose, elk, cougar, black bear, white-tailed deer and mule deer are found throughout the forested RGP area, making it a popular region for hunting (*Whitecourt/Anselmo Public Land Use Strategy*, 1999). Angling is also common, due to the relative plenitude of sport fish in the Athabasca, McLeod, Pembina and Paddle Rivers. These major rivers support a variety of species, from northern pike, walleye, burbot and mountain whitefish, to Arctic grayling, rainbow trout and gold-eye (*Whitecourt/Anselmo Public Land Use Strategy*, 1999). Detailed information about fishing and hunting regulations and licenses may be found at Alberta's Sustainable Resource Development website: <http://www.srd.gov.ab.ca/>.

Outfitting

In order for non-Albertans to hunt big game or game birds in our province, they must be accompanied by either a host hunter or a licensed outfitter-guide. According to the Alberta Professional Outfitters Society (APOS), there are "over 425 licensed big game and bird game outfitter-guides and 1600 licensed guides in Alberta" (*Alberta Professional Outfitters Society*, 2007). The considerable variety of big game species and well-established outfitting and guiding industry help to attract tourists to the communities within the RGP area.

Fish and Wildlife Resources

The varied forest cover and rolling terrain support a broad range of animals in the planning area. In addition to the big game and sport fish described above (see Hunting and Fishing), the area also supports grizzly bears (a species of concern in Alberta), a variety of microtines including shrews and voles, river otters, fox, several species of bats, waterfowl (including the "threatened" trumpeter swan, which breeds in lakes within the RGP), game birds (such as the ruffed grouse), and amphibians (e.g. boreal chorus frogs, tree frogs and the Canadian toad). The forest communities within the RGP provide breeding habitat for a large diversity of neo-tropical and resident song birds and woodland hawks and owls. The mixedwood forests along the Athabasca and McLeod River valleys provide particularly valuable habitat for ungulate populations (*Coal Branch Sub-Regional Integrated Resource Plan*, 2001).

Rare Plants

A data set is maintained by the Department of Tourism, Parks, Recreation and Culture for Alberta's rare plants. This data is used by proponents of land use activities to mitigate impacts to known locations for rare plants and by Government personnel to ensure these sites are being considered in land use decision making. The rare plant data set covers much of the RGP area.

Tourism and Recreation

There are seven provincial recreation areas within the plan boundary which support a range of activities, from camping, hiking, canoeing and swimming in the summer, to snowshoeing, skiing, and ice-fishing in

the winter. Wildland Parks and Natural Areas provide more remote, scenic landscapes which support relatively low environmental-impact activities such as wildlife viewing and mountain climbing. Mechanized recreational activities, such as ATV use and snowmobiling, are especially popular in the communities of Edson and Whitecourt.

Cultural and Historical Resources

There are no provincial historic sites within the Regional Grazing Plan area, and the majority of archaeological surveys conducted here are merely precursors to industrial development. There is subsequently little known about human activity in the area prior to the 19th century. However, the Whitecourt/Lesser Slave Lake area is known to have supported a number of fur trading posts and settlement communities during the 1800s. The Athabasca River was also a significant transportation route to the Rocky Mountains during this time (*Millar Western Forest Products Ltd. Detailed Forest Management Plan: 1997-2005, 2000*).

Water Resources

The RGP area is situated along the Athabasca River basin, which includes the McLeod, Athabasca, Freeman and Pembina rivers. These drainages and their adjoining tributaries provide water to local communities and industry, recreational opportunities, and critical fish and wildlife habitat. The environmental influences of timber and agricultural developments in the Athabasca River basin are examined in the *Northern River Basins Study Final Report* (1996). The Paddle River Headwaters Management Area is also located within the plan boundary.

Planning Area

Related Policy and Landscape Plans

Alberta's Commitment to Sustainable Resource and Environmental Management (1999) formally addresses the province's dedication to maintaining both a healthy environment and a healthy economy. All land management plans and policies should reflect this commitment; those most relevant to the present Regional Grazing Plan are outlined below.

Management of Alberta's forests follows the guidelines set out in *The Alberta Forest Legacy – A Framework for Sustainable Forest Management* (1998). The Alberta Forest Legacy encourages a shift "beyond land management practices designed for single outputs" toward practices which "blend consideration of all resource values, measurable and perceived" (*The Alberta Forest Legacy – A Framework for Sustainable Forest Management,* 1998). It pledges to increase collaboration between various industries and communities when developing forest management plans, and the Regional Grazing Plan was developed in reflection of this pledge.

The Northern East Slopes Sustainability Strategy (NES Strategy) was initiated in 1999 in order to bridge the gap between provincial policies and operational land management decisions (*Northern East Slopes Sustainable Resource and Environmental Management Strategy: The NES Strategy Interim Report*, 2001). By identifying resource management goals at the regional level, the strategy aims to balance the interests of government, industries, communities and aboriginal people, while also enhancing cooperation and communication between them. The NES Strategy area includes portions of the Athabasca and Smoky River watersheds, and also encompasses the towns of Whitecourt, Edson, Hinton and Grande Cache. In regard to domestic grazing, the NES Strategy plans to "maintain and enhance grazing opportunities in the region, respecting land capability and land-use compatibility", "encourage joint ventures between the forestry and agriculture sectors", and to "support development and implementation of the Grazing

Integration Plan for the Foothills and Woodlands areas" (*The Northern East Slopes Sustainable Resource and Environmental Management Strategy*, 2003).

Not to be confused with the Northern East Slopes Sustainability Strategy, the Policy for Resource Management of the Eastern Slopes defines management intentions for the entire Eastern Slopes region, which stretches from the United States border to just south of Grande Prairie. These intentions involve protection of areas unique to the Eastern Slopes, recognition of existing and potential development sites, and encouragement of "wise mixed use of the natural resources" within the region (*A Policy for Resource Management of the Eastern Slopes Revised 1984*). The policy is an important guide for resource management throughout the region; however, the Coal Branch Sub-Regional Integration Plan takes precedence where the Eastern Slopes overlap with the Regional Grazing Plan area (*Coal Branch Sub-Regional Integrated Resource Plan*, 2001). Timber and grazing management strategies should defer to the zoning and guidelines found in the latter document.

The Coal Branch sub-regional Integrated Resource Plan, completed in 1990, serves as a resource management guide within the Coal Branch Planning Area. It is one of several integrated resource plans developed for the Eastern Slopes Policy region. The planning area stretches as far west as Jasper National Park, south to the Brazeau and Pembina River watersheds, and as far east as Edson, where it crosses the Regional Grazing Plan (RGP) boundary. It is divided into eight smaller resource management areas (RMAs), of which two are represented within the RGP boundary: Yellowhead Corridor and Edson South – Pembina (*Coal Branch Sub-Regional Integrated Resource Plan*, 2001).

The Yellowhead Corridor RMA runs along the Yellowhead Highway, where agricultural land use is limited. A few small areas near Edson have been identified as potential sites for future crop production or improved grazing, given that forage resource management be intensified and grazing licenses be encouraged where public access is required (as opposed to grazing leases). The Integrated Resource Plan also stresses that, "range management plans must recognize the need for protective management vegetation on eolian soils" (*Coal Branch Sub-Regional Integrated Resource Plan*, 2001). Timber management strategies for the Yellowhead Corridor are particular to each Forest Management Unit (FMU) within it, but in general promote a sustained yield of timber. Coordination of agricultural development with the use of coniferous and deciduous resources is also a priority (*Coal Branch Sub-Regional Integrated Resource Plan*, 2001).

The Edson South – Pembina RMA is situated along the eastern border of the Coal Branch Planning Area, and just inside the western corner of the RGP boundary. Rangeland management primarily revolves around the Sang Lake Grazing Reserve, of which 2,784 ha are located within the Edson South – Pembina RMA. Management guidelines include maintaining "the 1985 carrying capacity (900 animal units per grazing season) of the Sang Lake Provincial Grazing Reserve" as a minimum (*Coal Branch Sub-Regional Integrated Resource Plan*, 2001). The Integrated Resource Plan also aims to "maintain and enhance timber yield" via "prompt reforestation and intensive forest management practices" (*Coal Branch Sub-Regional Integrated Resource Plan*, 2001).

The Athabasca River Sandhills lie just inside the North-east boundary of the Regional Grazing Plan area. A number of unique and sensitive natural landscapes may be found here, including transverse and parabolic sand dunes formed following the last ice age (*Athabasca River Sandhills Access and Protection Plan*, 1997). In order to reconcile the demands of numerous recreational visitors with the need to protect the local watershed and sensitive soils, the Athabasca River Sandhills Access and Protection Plan was developed. The established planning area is located near Fort Assiniboine and encompasses five Access and Protection Areas (APAs): Holmes Crossing Sandhills Ecological Reserve, Holmes Crossing Forest Land Use Zone, Fort Assiniboine Sandhills Wildland Park, Timeu Off-Highway Vehicle Recreation Area, and Vega Natural Area. Both the Holmes Crossing Forest Land Use Zone and the Timeu Off-Highway Vehicle (OHV) Recreation Area permit logging activities, while domestic grazing activities are permitted in the latter APA only (*Athabasca River Sandhills Access and Protection Plan*, 1997).

The Paddle River Headwaters Management Area lies on the eastern edge of the Lower Foothills sub-region, southeast of Whitecourt, and surrounding the Upper Paddle River Basin. The watershed in this area plays a major role in the control and prevention of floods, and local land management practices must be compatible with runoff control (*Watershed Management in the Paddle River Headwaters*, 1986). It is important to retain forest cover, as vegetated land holds soil in place, maintains infiltration and increases the soil water storage potential (Hewlett, 1992). Consequently, SRD promotes sustainable logging activity in the Paddle River basin in an effort to retain the maximum amount of forest cover. Timber harvesting is permitted throughout the Paddle River Headwaters Area, but particular restrictions may apply. Careful grazing management is also needed to ensure the water storage capacity of the soil is not compromised by compaction from concentrated cattle activity. New grazing licenses and improved grazing activity are allowable within the management area, but land clearing is only considered on a site-specific basis (*Watershed Management in the Paddle River Headwaters*, 1986).

The Cold Creek Regional Integrated Decision (CCRID) was developed in 1991 in response to increasing land use pressures on the southern portion of the W01 FMU. It concerns 108,523 ha of land, at the centre of the RGP area, and on both the north and south sides of Highway 16. Deciding members of the Eastern Slopes Regional Resource Committee agreed to support sustained-yield forest management practices, as opposed to timber liquidation. They recommended "60 percent [of the land be] designated for sustained-yield timber production, and 40 percent designated for forage production" (*Cold Creek Regional Integrated Decision: East Slopes Region*, 1992).

Land management decisions within the northern portion of the W01 FMU are subject to the Whitecourt/Anselmo Public Land Use Strategy (PLUS). The PLUS area lies completely within the RGP boundary, in the vicinity of Whitecourt. The strategy strives to "provide direction to land managers on the use and allocation of public land with full consideration of input from the local public" (*Whitecourt/Anselmo Public Land Use Strategy*, 1999). It endorses a general 60/40 management ratio (60% for sustained timber production and 40% for forage production) for public land currently under disposition, and outlines specific resource management directions for vacant land within the four sub-units which compose the PLUS area.

Detailed Forest Management Plans

There are five forestry companies holding Forest Management Agreements in the Regional Grazing Plan area: Millar Western Forest Products Limited, Blue Ridge Lumber Inc., Sundance Forest Industries Limited, Hinton Wood Products, and Weyerhaeuser Company Limited – Edson division. As required by all Forest Management Agreements, each of these companies must produce a detailed forest management plan (DFMP). Their respective positions on grazing within FMA areas may be found within these DFMPs, and they have been briefly summarized below. Most were published before the recent *Grazing and Timber Integration Manual (2006),* however, it is expected that future forest management plans will be in keeping with the standards presented in the manual.

The southeast corner of the Blue Ridge Lumber FMA is located within the Regional Grazing Plan area. In general, "Blue Ridge Lumber does not support further development of grazing or homesteads within the FMA area", but it will consider licenses which are issued for sites having limited impact on forested areas (e.g. powerlines or pipelines), and will work with Alberta Sustainable Resource Development to assess grazing license applications and renewals (*Blue Ridge Lumber Inc. Detailed Forest Management Plan: Text Report, 2005*).

Much of the land surrounding Whitecourt, as well as a large portion in the far north-west end of the RGP area, is part of Millar Western Forest Products Forest Management Agreement. When dealing with grazing dispositions within the FMA, Millar Western adheres to their Operating Ground Rules (*Millar Western Forest Products Ltd. Detailed Forest Management Plan: 1997-2005, 2000*). As well, in

conjunction with Weyerhaeuser Company Ltd. (Edson), Millar Western produced *Guidelines for Integrating Timber Harvesting and Domestic Grazing in the Green Area* (2002). These guidelines were designed to ease mediation efforts between timber and grazing operators and to provide a breakdown of the responsibilities of each party.

The FMA holder with the largest representation within the plan area is Weyerhaueser – Edson division. In addition to producing *Guidelines for Integrating Timber Harvesting and Domestic Grazing in the Green Area* (2002) with Miller Western (see above), Weyerhaeuser – Edson division has committed to following guidelines set out in the *Grazing and Timber Integration Manual* (2006) and to their operating ground rules.

Sundance Forest Industries Ltd. operates on a small area of land within the RGP boundary, south of Edson and adjacent to the Weyerhaeuser FMA. In regards to active grazing dispositions within their FMA area, Sundance intends to comply with their Operating Ground Rules by "minimiz[ing] the impact of timber operations on range resources and domestic grazing" (*Sundance Forest Industries Ltd. Harvest Planning and Operating Ground Rules,* 2001).

A relatively small portion of the land along the far west boundary of the RGP area is managed under the Hinton Wood Products FMA. Company policy is to "support [grazing] permit applications in those areas where regenerating stands are not threatened, and where no harvesting is scheduled in the short term" (*Weldwood 1999 Forest Management Plan: 1999-2008, 2000*).

Existing Rights And Regulations

Excerpts from the regulatory documents concerning rights and responsibilities of timber and grazing disposition holders are provided below.

Forest Management Agreements

Timber operators entering into FMAs are granted the right to "enter upon the forest management area to establish, grow, harvest, and remove timber thereon on a perpetual sustained-yield basis". (*Forests Act Forest Management Agreement*, 1997). However, "the Minister reserves all land rights on the forest management area" including the right "to authorize domestic stock grazing provided…that the growth performance of the managed species is not impaired and the regeneration will not be damaged by domestic stock grazing to the point where the overall stocking is reduced below the reforestation standard" (*Forests Act Forest Management Agreement*, 1997). Guiding policies for all forest management agreements are contained in the Forests Act (see below).

Forests Act

According to the Forests Act, the Minister "shall administer and manage timber on public land under his administration and standing and cut timber on all road allowances" (*Forests Act*, 2000). As well, "the Minister may from time to time fix or alter the volume of timber that may be harvested or the amount of forest land on which the timber may be harvested by a timber quota holder during each quadrant" in order to maintain a balance between timber depletion and growth (*Forests Act*, 2000).

Public Lands Act

The Minister has the authority to grant grazing dispositions on public land "when, in the Minister's opinion, the best use that may be made of the land is the grazing of livestock" (*Public Lands Act*, 2000).

Operating Ground Rules

Each Forest Management Agreement area has its own set of *Timber Harvest Planning and Operating Ground Rules* which provide guidelines, objectives and standards for timber harvesting in Alberta. These ground rules must be adhered to by all timber operators in the province. To help mediate grazing and timber integration, the ground rules are designed "to minimize the impact of timber operations on range resources and domestic grazing, and to protect improvements on public land". In general, the standards met by timber operators to achieve this objective include: frequent communication with grazing disposition holders, maintenance of roads and other infrastructure associated with active grazing dispositions, and due care in protecting range carrying capacities for domestic grazing (*Alberta Timber Harvest Planning and Operating Ground Rules*, 1994).

Weyerhaeuser Pembina's (which includes Edson FMA) Timber Harvesting Planning and Operating Ground Rules state, "The Forest Operator shall follow the requirements of Directive 2006-01" *Integration of Grazing and Timber Activities*.

APPENDIX 2:
Detailed Description and Data Tables for the Grazing Potential Analyses.

Table 3.1a. Central Mixedwood ecosite phases, their estimated stocking rate and grazing potential category used in Whitecourt-Edson RGP

Ecosite Phase Code	Ecosite Phase Name	Stocking Rate (AUM/ac)	Stocking Rate (ha/AUM)	Grazing Potential Category
a1	lichen Pj	0.0	40.0	Non-use
aa1	plains wormwood	0.1	6.1	Fair
b1	blueberry Pj-Aw	0.0	40.5	Non-use
b2	blueberry Aw(Bw)	0.1	2.7	Fair
b3	blueberry Aw-Sw	0.0	21.1	Non-use
b4	blueberry Sw-Pj	0.0	40.0	Non-use
c1	Labrador tea-mesic Pj-Sb	0.0	40.0	Non-use
d1	low-bush cranberry Aw	0.1	3.0	Fair
d2	low-bush cranberry Aw-Swim	0.1	4.1	Fair
d3	low-bush cranberry Sw	0.0	40.0	Non-use
e1	dogwood Pb-Aw	0.1	3.9	Fair
e2	dogwood Pb-Sw	0.0	40.0	Non-use
e3	dogwood Sw	0.0	21.1	Non-use
f1	horsetail Pb-Aw	0.2	2.0	Fair
f2	horsetail Pb-Sw	0.0	40.0	Non-use
f3	horsetail Sw	0.0	40.0	Non-use
g1	Labrador tea-subhygric Sb-Pj	0.0	40.0	Non-use
h1	Labrador tea/horsetail Sw-Sb	0.0	40.0	Non-use
i1	treed bog	0.0	40.0	Non-use
i2_j2	shrubby bog/shrubby poor fen	0.0	40.0	Non-use
k1	treed rich fen	0.0	40.0	Non-use
k3	graminoid rich fen	0.9	0.5	Good
l1	marsh	0.0	20.5	Non-use
d4	shrubland	0.7	0.6	Good
e4	shrubland	0.0	16.9	Non-use
j1	treed poor fen	0.0	40.0	Non-use
j2	shrubby poor fen	0.0	40.0	Non-use
j3	grassland	0.0	40.0	Non-use

Table 3.1b. Dry Mixedwood ecosite phases, their estimated stocking rate and grazing potential category used in Whitecourt-Edson RGP

Ecosite Phase Code	Ecosite Phase Name	Stocking Rate (AUM/ac)	Stocking Rate (ha/AUM)	Grazing Potential Category
aa1	plains wormwood	0.1	4.1	Fair
b1	blueberry Pj-Aw	0.0	8.1	Non-use
b3	blueberry Aw-Sw	0.0	8.1	Non-use
b4	blueberry Sw-Pj	0.0	40.0	Non-use
c1	Labrador tea-mesic Pj-Sb	0.0	40.0	Non-use
d1	low-bush cranberry Aw	0.2	2.5	Fair
d2	low-bush cranberry Aw-Sw	0.1	4.1	Fair
e2	dogwood Pb-Sw	0.0	13.5	Non-use
g1	Labrador tea-subhygric Sb-Pj	0.0	40.0	Non-use
i1	treed bog	0.0	40.0	Non-use
i2	shrubby bog	0.0	40.0	Non-use
k1	treed rich fen	0.5	0.8	Good
k3	graminoid rich fen	0.9	0.5	Good
a1	lichen Pj	0.0	40.0	Non-use
b2	blueberry Aw(Bw)	0.1	2.7	Fair
bb1	western porcupine grass	0.4	1.0	Good
bb2	northern wheat grass	0.3	1.4	Good
d3	low-bush cranberry Sw	0.0	40.5	Non-use
d4	shrubland	0.1	3.0	Fair
dd1	California oat grass-slender wheat grass	1.0	0.4	Good
e1	dogwood Pb-Aw	0.2	2.5	Fair
e4	dogwood shrubland	0.4	1.0	Good
f1	horsetail Pb-Aw	0.1	4.1	Fair
f2	horsetail Pb-Sw	0.0	40.0	Non-use
f4	horsetail/willow	0.0	14.4	Non-use
f5	horsetail/Bw	0.0	8.1	Non-use
g2	saline	0.0	33.2	Non-use
j1	treed poor fen	0.0	40.0	Non-use
j3	grass poor fen	0.0	40.0	Non-use
k2	shrubby rich fen	0.5	0.8	Good
l1	marsh	0.0	27.2	Non-use

Table 3.1c. Lower Foothills ecosite phases, their estimated stocking rate and grazing potential category used in Whitecourt-Edson RGP

Ecosite Phase Code	Ecosite Phase Name	Stocking Rate (AUM/ac)	Stocking Rate (ha/AUM)	Grazing Potential Category
b1	bearberry Aw-Sw-Pl	0.1	8.0	Fair
c1	hairy wild rye Pl	0.1	8.0	Fair
c3	hairy wild rye Aw-Sw-Pl	0.1	4.0	Fair
c4	hairy wild rye Sw	0.1	8.0	Fair
c5	hairy wild rye shrubland	0.1	2.7	Fair
c6	hairy wild rye grasslands	0.1	2.7	Fair
c7	hairy wild rye tame	0.6	0.7	Good
d1	Labrador tea-mesic Pl-Sb	0.0	40.0	Non-use
d2_e1	Labrador tea-mesic Pl/low-bush cranberry Pl	0.1	8.0	Fair
d3	Labrador tea-mesic Aw-Sw-Pl	0.1	8.0	Fair
e2	low-bush cranberry Aw	0.2	2.2	Fair
e3	low-bush cranberry Aw-Sw-Pl	0.1	5.7	Fair
e4	low-bush cranberry Sw	0.0	24.0	Non-use
e5	low-bush cranberry shrubland	0.2	2.4	Fair
e9	low-bush cranberry tame	0.6	0.6	Good
f1	bracted honeysuckle/fern Pl	0.0	40.0	Non-use
f2	bracted honeysuckle/fern Aw-Pb	0.0	10.3	Non-use
f3	bracted honeysuckle/fern Aw-Sw-Pl	0.1	5.0	Fair
f4	bracted honeysuckle/fern Sw	0.1	8.0	Fair
f5	bracted honeysuckle shrubland	0.4	1.0	Good
f7	bracted honeysuckle tame	1.1	0.4	Good
g2	forb meadow	0.7	0.6	Good
g3	graminoid meadow	0.7	0.6	Good
h1_j1	Labrador tea-subhygric Sb-Pl/Labrador tea/horsetail Sb-Sw	0.0	40.0	Non-use
i1	horsetail Pb-Aw	0.1	3.4	Fair
i2	horsetail Pb-Sw	0.0	40.0	Non-use
k1	treed bog	0.0	40.0	Non-use
k2	shrubby bog	0.0	40.0	Non-use
l1	treed poor fen	0.0	40.0	Non-use
m1	treed rich fen	0.0	40.0	Non-use
m3	graminoid rich fen	0.9	0.5	Good
n1	marsh	0.0	40.0	Non-use

Table 3.1d. Upper Foothills ecosite phases, their estimated stocking rate and grazing potential category used in Whitecourt-Edson RGP

Ecosite Phase Code	Ecosite Phase Name	Stocking Rate (AUM/ac)	Stocking Rate (ha/AUM)	Grazing Potential Category
a1	shrubby grassland	0.0	40.0	Non-use
b1	bearberry/lichen Pl	0.0	40.0	Non-use
c1	hairy wild rye Pl	0.0	21.0	Non-use
c2	hairy wild rye Aw	0.2	2.5	Fair
c3	hairy wild rye Aw-Sw-Pl	0.1	4.7	Fair
c4	hairy wild rye Sw	0.0	40.0	Non-use
c5	yellow mtn. avens	0.0	40.0	Non-use
c6	hairy wild rye grassland	0.0	40.0	Non-use
d1	Labrador tea-mesic Pl-Sb	0.0	40.0	Non-use
e1	tall bilberry/arnica Pl	0.0	22.5	Non-use
e2	tall bilberry/arnica Aw-Sw-Pl	0.0	21.0	Non-use
e3	tall bilberry/arnica Sw	0.0	40.0	Non-use
e4	tall bilberry/arnica Fa	0.0	40.0	Non-use
e5		0.0	40.0	Non-use
f1	bracted honeysuckle Pl	0.0	40.0	Non-use
f2	bracted honeysuckle Pb	0.2	2.2	Fair
f3	bracted honeysuckle Pb-Sw-Pl	0.0	40.0	Non-use
f4	bracted honeysuckle Sw	0.0	40.0	Non-use
f5	bracted honeysuckle Fa	0.0	40.0	Non-use
f6	bracted honeysuckle willow	0.0	40.0	Non-use
ff1	grassland	0.1	3.5	Fair
ff2	shrubland	0.4	1.0	Good
g1	shrubby meadow	0.0	27.0	Non-use
g2	forb meadow	0.5	0.7	Good
g3	grass meadow	0.8	0.5	Good
h1	Labrador tea-subhygric Sb-Pl	0.0	40.0	Non-use
i1_j1	Labrador tea/horsetail Sb-Sw/horsetail SW	0.0	40.0	Non-use
k1	treed bog	0.0	40.0	Non-use
k2	shrubby bog	0.0	40.0	Non-use

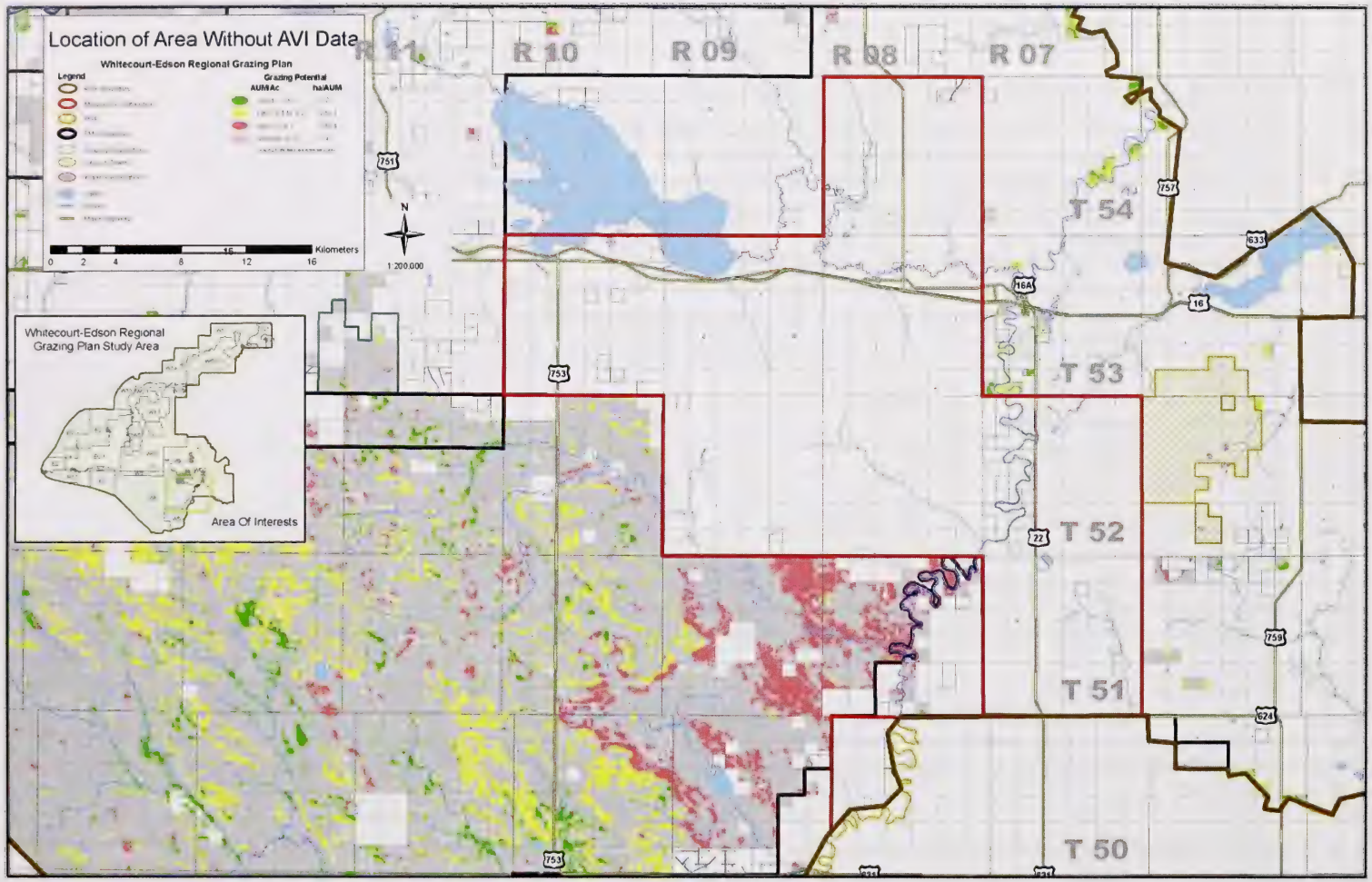


Figure 3.1. Location of the Area within the Whitecourt-Edson Regional Grazing Plan Where No AVI was Available

Table 3.2. Summary of grazing potential categories (ha), total area (ha) and gross grazing potential (ha) for each FMU within the Whitecourt-Edson RGP

FMA	FMU	Good (ha)	Fair (ha)	Poor (ha)	Non Use (ha)	Total Area (ha)	Gross Grazing Potential (ha)*
Weyerhaeuser	**W6**	12 393	29 229	8 572	137 343	187 537	50 194
	W5	9 338	12 404	3 219	46 497	71 458	24 961
	E1	3 079	3 905	72	25 246	32 302	7 056
	E2	6 024	29 517	885	61 642	98 068	36 426
Millar Western	**W11**	1 978	5 661	18 419	47 599	73 657	26 058
	W13	3 070	37 261	7 330	45 255	92 916	47 661
Blue Ridge Lumber	**W14**	2 695	11 132	8 667	36 024	58 518	22 494
Hinton West Fraser	**E3**	2 687	11 959	228	39 141	54 015	14 874
Sundance	**R13**	1 848	5 570	457	24 560	32 435	7 875
White Area	**W01**	34 014	21 477	20 657	88 974	165 122	76 148
	E01	39 161	22 592	479	47 617	109 849	62 232
	S01	1 099	485	315	6 575	8 474	1 899
	S7	669	313	2 761	16 401	20 144	3 743
	W02	21 594	19 129	42 248	112 162	195 133	82 971
RGP TOTAL		139 649	210 634	114 309	735 036	1 199 628	464 592

*Non Use includes vegetation not suitable for livestock grazing and unvegetated AVI polygons; non use (ha) were therefore not included in the estimate of gross grazing potential.

Table 3.3. Descriptions of Administrative and Environmental Deletions Used to Determine Available Net Grazing

Administrative Exclusions	
Existing Dispositions	GRL, FGL, GRP, LOC, PLA etc.
PNT	Protective notations restricting livestock grazing
PGR	Provincial Grazing Reserves
Freehold/Freehold Mixed	Private land or quarter-sections with private/public land mixed.
Order in Council Natural Areas	
Parks and Protected Areas	
Environmental Exclusions	
Trumpeter Swan Areas	Areas designated in regional referral guidelines.
Caribou Areas	Areas designated in regional referral guidelines.
Riparian Areas	100 m buffer on large rivers and all waterbodies; 60 m on small rivers.
Anthropogenic Vegetation	Vegetation on well sites and pipelines

Table 3.4a. Administrative and Environmental Exclusions (ha) for FMU W6

Administrative Exclusions	Good (ha)	Fair (ha)	Poor (ha)	Non Use (ha)	Total Area (ha)
PNTs Restricting Grazing	279	1 189	881	5 766	8 115
Freehold/Mixed Freehold Land	17	35	145	840	1 037
Existing Grazing Dispositions	18	891	366	1 136	2 411
Provincial Grazing Reserves	646	40	35	866	1 787
Landuse AVI & Company Data*	2 831	1 493	355	5 670	10 349
Roads*	79	308	36	656	1 079
Order in Council Natural Areas	5	23	-	22	50
Parks and Protected Areas	-	-	-	-	-
Environmental Exclusions	**Good (ha)**	**Fair (ha)**	**Poor (ha)**	**Non Use (ha)**	**Total Area (ha)**
Riparian Area Buffers*	1 395	71	176	2 308	3 950
Caribou Areas	-	-	-	-	-
Trumpeter Swan/Heron Areas	-	-	-	-	-
TOTAL DELETIONS	5 270	4 250	1 994	17 264	28 778

*Landuse AVI & Company Data used to estimate industrial related dispositions
*Riparian Area Buffers = 100m on larger rivers and waterbodies; 60 m on small rivers.
*Roads = road data from timber companies

Table 3.4b. Administrative and Environmental Exclusions (ha) for FMU W5

Administrative Exclusions	Good (ha)	Fair (ha)	Poor (ha)	Non Use (ha)	Total Area (ha)
PNTs Restricting Grazing	457	1 162	590	4 974	7 183
Freehold/Mixed Freehold Land	1 142	874	299	1 486	3 801
Existing Grazing Dispositions	867	4 367	425	4 467	10 126
Provincial Grazing Reserves	3 855	1 247	318	2 635	8 055
Landuse AVI & Company Data*	999	583	242	1 959	3 783
Roads*	47	122	28	270	467
Order in Council Natural Areas	-	-	-	-	-
Parks and Protected Areas	-	-	-	-	-
Environmental Exclusions	**Good (ha)**	**Fair (ha)**	**Poor (ha)**	**Non Use (ha)**	**Total Area (ha)**
Riparian Area Buffers*	324	75	30	656	1 085
Caribou Areas	-	-	-	-	-
Trumpeter Swan/Heron Areas	-	-	-	-	-
TOTAL DELETIONS	7 691	8 430	1 932	16 447	34 500

*Landuse AVI & Company Data used to estimate industrial related dispositions
*Riparian Area Buffers = 100m on larger rivers and waterbodies; 60 m on small rivers.
*Roads = road data from timber companies

Table 3.4c. Administrative and Environmental Exclusions (ha) for FMU E1

Administrative Exclusions	Good (ha)	Fair (ha)	Poor (ha)	Non Use (ha)	Total Area (ha)
PNTs Restricting Grazing	119	253	6	974	1 352
Freehold/Mixed Freehold Land	56	78	3	292	429
Existing Grazing Dispositions	-	15	-	42	57
Provincial Grazing Reserves	1 156	318	3	1 057	2 534
Landuse AVI & Company Data*	458	169	1	689	1 317
Roads*	17	39	-	58	114
Order in Council Natural Areas	-	-	-	-	-
Parks and Protected Areas	-	-	-	-	-
Environmental Exclusions	**Good (ha)**	**Fair (ha)**	**Poor (ha)**	**Non Use (ha)**	**Total Area (ha)**
Riparian Area Buffers*	43	15	1	697	756
Caribou Areas	-	-	-	-	-
Trumpeter Swan/Heron Areas	-	-	-	-	-
TOTAL DELETIONS	1 849	887	14	3 809	6 559

*Landuse AVI & Company Data used to estimate industrial related dispositions
*Riparian Area Buffers = 100m on larger rivers and waterbodies; 60 m on small rivers.
*Roads = road data from timber companies

Table 3.4d. Administrative and Environmental Exclusions (ha) for FMU E2

Administrative Exclusions	Good (ha)	Fair (ha)	Poor (ha)	Non Use (ha)	Total Area (ha)
PNTs Restricting Grazing	1 211	13 774	511	19 701	35 197
Freehold/Mixed Freehold Land	1 931	1 644	42	2 278	5 895
Existing Grazing Dispositions	587	3 742	26	5 968	10 323
Provincial Grazing Reserves	-	-	-	-	-
Landuse AVI & Company Data*	584	566	4	1 304	2 458
Roads*	16	200	4	242	462
Order in Council Natural Areas	-	-	-	5	5
Parks and Protected Areas	-	7	-	24	31
Environmental Exclusions	**Good (ha)**	**Fair (ha)**	**Poor (ha)**	**Non Use (ha)**	**Total Area (ha)**
Riparian Area Buffers*	511	141	20	797	1 469
Unvegetated AVI polygons*	-	-	-	3 742	3 742
Caribou Areas	-	-	-	-	-
Trumpeter Swan/Heron Areas	15	194	-	388	597
TOTAL DELETIONS	4 855	20 268	607	30 707	56 437

*Landuse AVI & Company Data used to estimate industrial related dispositions
*Riparian Area Buffers = 100m on larger rivers and waterbodies; 60 m on small rivers.
*Roads = road data from timber companies

Table 3.4e. Administrative and Environmental Exclusions (ha) for FMU W11

Administrative Exclusions	Good (ha)	Fair (ha)	Poor (ha)	Non Use (ha)	Total Area (ha)
PNTs Restricting Grazing	107	278	1 731	1 982	4 098
Freehold/Mixed Freehold Land	17	88	1 732	6 946	8 783
Existing Grazing Dispositions	1	84	1 990	1 986	4 061
Provincial Grazing Reserves	-	-	-	-	-
Landuse AVI & Company Data*	282	155	442	548	1 427
Roads*	7	55	42	121	225
Order in Council Natural Areas	1	-	266	354	621
Parks and Protected Areas	-	-	-	-	-
Environmental Exclusions	**Good (ha)**	**Fair (ha)**	**Poor (ha)**	**Non Use (ha)**	**Total Area (ha)**
Riparian Area Buffers*	278	111	394	1 394	2 177
Caribou Areas	28	5	718	2 498	3 249
Trumpeter Swan/Heron Areas	86	57	195	238	576
TOTAL DELETIONS	807	833	7 510	16 067	25 217

*Landuse AVI & Company Data used to estimate industrial related dispositions
*Riparian Area Buffers = 100m on larger rivers and waterbodies; 60 m on small rivers.
*Roads = road data from timber companies

Table 3.4f. Administrative and Environmental Exclusions (ha) for FMU W13

Administrative Exclusions	Good (ha)	Fair (ha)	Poor (ha)	Non Use (ha)	Total Area (ha)
PNTs Restricting Grazing	483	6 663	1 631	8 352	17 129
Freehold/Mixed Freehold Land	566	3 065	672	1 560	5 863
Existing Grazing Dispositions	570	4 708	1 008	3 258	9 544
Provincial Grazing Reserves	-	-	-	-	-
Landuse AVI & Company Data*	380	441	70	511	1 402
Roads*	21	80	-	56	157
Order in Council Natural Areas	2	8	2	2	14
Parks and Protected Areas	-	-	-	-	
Environmental Exclusions	**Good (ha)**	**Fair (ha)**	**Poor (ha)**	**Non Use (ha)**	**Total Area (ha)**
Riparian Area Buffers*	89	181	252	1 054	1 576
Caribou Areas	-	-	-	-	-
Trumpeter Swan/Heron Areas	-	-	-	-	-
TOTAL DELETIONS	2 111	15 146	3 635	14 793	35 685

*Landuse AVI & Company Data used to estimate industrial related dispositions
*Riparian Area Buffers = 100m on larger rivers and waterbodies; 60 m on small rivers.
*Roads = road data from timber companies

Table 3.4g. Administrative and Environmental Exclusions (ha) for FMU W14

Administrative Exclusions	Good (ha)	Fair (ha)	Poor (ha)	Non Use (ha)	Total Area (ha)
PNTs Restricting Grazing	193	125	244	639	1 201
Freehold/Mixed Freehold Lands	173	587	454	1 960	3 174
Existing Grazing Dispositions	-	-	252	126	378
Provincial Grazing Reserves	-	-	-	-	-
Landuse AVI & Company Data*	389	115	104	356	964
Roads*	12	11	27	91	141
Order in Council Natural Areas	-	-	-	-	-
Parks and Protected Areas	-	-	-	-	-
Environmental Exclusions	**Good (ha)**	**Fair (ha)**	**Poor (ha)**	**Non Use (ha)**	**Total Area (ha)**
Riparian Area Buffers*	458	163	188	1 166	1 975
Caribou Areas	-	-	-	-	-
Trumpeter Swan/Heron Areas	10	120		175	305
TOTAL DELETIONS	1 235	1 121	1 269	4 513	8 138

*Landuse AVI & Company Data used to estimate industrial related dispositions
*Riparian Area Buffers = 100m on larger rivers and waterbodies; 60 m on small rivers.
*Roads = road data from timber companies

Table 3.4h. Administrative and Environmental Exclusions (ha) for FMU E3

Administrative Exclusions	Good (ha)	Fair (ha)	Poor (ha)	Non Use (ha)	Total Area (ha)
PNTs Restricting Grazing	537	2 067	32	5 499	8 135
Freehold/Mixed Freehold Land	147	20	-	79	246
Existing Grazing Dispositions	26	102	-	64	192
Provincial Grazing Reserves	-	-	-	-	-
Landuse AVI & Company Data*	28	65	1	121	215
Roads*	3	46	-	54	103
Order in Council Natural Areas	-	-	-	-	-
Parks and Protected Areas	-	17	-	3	20
Environmental Exclusions	**Good (ha)**	**Fair (ha)**	**Poor (ha)**	**Non Use (ha)**	**Total Area (ha)**
Riparian Area Buffers*	94	17	1	220	332
Caribou Areas	-	-	-	-	-
Trumpeter Swan/Heron Areas	18	174	7	478	677
TOTAL DELETIONS	853	2 508	41	6 518	9 920

*Landuse AVI & Company Data used to estimate industrial related dispositions
*Riparian Area Buffers = 100m on larger rivers and waterbodies; 60 m on small rivers.
*Roads = road data from timber companies

Table 3.4i. Administrative and Environmental Exclusions (ha) for FMU R13

Administrative Exclusions	Good (ha)	Fair (ha)	Poor (ha)	Non Use (ha)	Total Area (ha)
PNTs Restricting Grazing	518	1,234	131	3 933	5 816
Freehold/Mixed Freehold Land	333	146	18	426	923
Existing Grazing Dispositions					
Provincial Grazing Reserves	-	-	-	-	-
Landuse AVI & Company Data*	330	169	6	689	1 194
Roads*	-	-	-	-	-
Order in Council Natural Areas	-	-	-	-	-
Parks and Protected Areas	-	-	-	-	-
Environmental Exclusions	**Good (ha)**	**Fair (ha)**	**Poor (ha)**	**Non Use (ha)**	**Total Area (ha)**
Riparian Area Buffers*	84	191	13	718	1 006
Caribou Areas	-	-	-	-	-
Trumpeter Swan/Heron Areas	48	255	-	122	425
TOTAL DELETIONS	1 313	1 995	168	5 888	9 364

*Landuse AVI & Company Data used to estimate industrial related dispositions
*Riparian Area Buffers = 100m on larger rivers and waterbodies; 60 m on small rivers.
*Roads = road data from timber companies

Table 3.4j. Administrative and Environmental Exclusions (ha) for FMU E4

Administrative Exclusions	Good (ha)	Fair (ha)	Poor (ha)	Non Use (ha)	Total Area (ha)
PNTs Restricting Grazing	-	-	-	-	-
Freehold/Mixed Freehold Land	-	-	-	-	-
Existing Grazing Dispositions	-	-	-	-	-
Provincial Grazing Reserves	-	-	-	-	-
Landuse AVI & Company Data*	-	-	-	-	-
Roads*	1	-	-	7	8
Order in Council Natural Areas	-	-	-	-	-
Parks and Protected Areas	-	-	-	-	-
Environmental Exclusions	**Good (ha)**	**Fair (ha)**	**Poor (ha)**	**Non Use (ha)**	**Total Area (ha)**
Riparian Area Buffers*	17	-	1	32	50
Caribou Areas	-	-	-	-	-
Trumpeter Swan/Heron Areas	-	-	-	-	-
TOTAL DELETIONS	18	-	1	39	58

*Landuse AVI & Company Data used to estimate industrial related dispositions
*Riparian Area Buffers = 100m on larger rivers and waterbodies; 60 m on small rivers.
*Roads = road data from timber companies

Table 3.4k. Administrative and Environmental Exclusions (ha) for FMU W01

Administrative Exclusions	Good (ha)	Fair (ha)	Poor (ha)	Non Use (ha)	Total Area (ha)
PNTs Restricting Grazing	1 433	2 638	2 024	12 672	18 767
Freehold/Mixed Freehold Land	28 102	10 337	12 267	46 977	97 683
Existing Grazing Dispositions	2 055	6 071	4 466	12 413	25 005
Provincial Grazing Reserves	-	-	-	-	-
Landuse AVI & Company Data*	265	-	-	-	265
Roads*	-	-	-	-	-
Order in Council Natural Areas	2	156	71	31	260
Parks and Protected Areas	1	-	18	32	51
Environmental Exclusions	**Good (ha)**	**Fair (ha)**	**Poor (ha)**	**Non Use (ha)**	**Total Area (ha)**
Riparian Area Buffers*	303	240	652	273	1 468
Caribou Areas	-	-	-	-	-
Trumpeter Swan/Heron Areas	17	73	148	171	409
TOTAL DELETIONS	32 178	19 515	19 646	72 569	143 908

*Landuse AVI & Company Data used to estimate industrial related dispositions
*Riparian Area Buffers = 100m on larger rivers and waterbodies; 60 m on small rivers.
*Roads = road data from timber companies

Table 3.4l. Administrative and Environmental Exclusions (ha) for FMU E01

Administrative Exclusions	Good (ha)	Fair (ha)	Poor (ha)	Non Use (ha)	Total Area (ha)
PNTs Restricting Grazing	996	2 221	117	6 056	9 390
Freehold/Mixed Freehold Land	34 478	14 412	270	23 251	72 411
Existing Grazing Dispositions	1 085	3 048	17	4 831	8 981
Provincial Grazing Reserves	-	-	-	-	-
Landuse AVI & Company Data*	328	-	-	-	328
Roads*	-	-	-	-	-
Order in Council Natural Areas	-	-	-	-	-
Parks and Protected Areas	-	-	-	-	-
Environmental Exclusions	**Good (ha)**	**Fair (ha)**	**Poor (ha)**	**Non Use (ha)**	**Total Area (ha)**
Riparian Area Buffers*	340	381	12	368	1 101
Caribou Areas	-	-	-	-	-
Trumpeter Swan/Heron Areas	-	-	-	-	-
TOTAL DELETIONS	37 227	20 062	416	34 506	92 211

*Landuse AVI & Company Data used to estimate industrial related dispositions
*Riparian Area Buffers = 100m on larger rivers and waterbodies; 60 m on small rivers.
*Roads = road data from timber companies

Table 3.4m. Administrative and Environmental Exclusions (ha) for FMU S01

Administrative Exclusions	Good (ha)	Fair (ha)	Poor (ha)	Non Use (ha)	Total Area (ha)
PNTs Restricting Grazing	25	10	41	731	807
Freehold/Mixed Freehold Land	1 013	445	196	5 455	7 109
Existing Grazing Dispositions	1	29	6	33	69
Provincial Grazing Reserves	-	-	-	-	-
Landuse AVI & Company Data*	-	-	-	-	-
Roads*	-	-	-	-	-
Order in Council Natural Areas	-	-	-	-	-
Parks and Protected Areas	-	-	-	-	-
Environmental Exclusions	**Good (ha)**	**Fair (ha)**	**Poor (ha)**	**Non Use (ha)**	**Total Area (ha)**
Riparian Area Buffers*	23	-	20	56	99
Caribou Areas	-	-	-	-	-
Trumpeter Swan/Heron Areas	-	-	-	-	-
TOTAL DELETIONS	1 062	484	263	6 275	8 084

*Landuse AVI & Company Data used to estimate industrial related dispositions
*Riparian Area Buffers = 100m on larger rivers and waterbodies; 60 m on small rivers.
*Roads = road data from timber companies

Table 3.4n. Administrative and Environmental Exclusions (ha) for FMU S7

Administrative Exclusions	Good (ha)	Fair (ha)	Poor (ha)	Non Use (ha)	Total Area (ha)
PNTs Restricting Grazing	37	42	937	1 478	2 494
Freehold/Mixed Freehold Land	247	112	649	7 318	8 326
Existing Grazing Dispositions	70	93	77	540	780
Provincial Grazing Reserves	-	-	-	-	-
Landuse AVI & Company Data*	1	-	-	-	1
Roads*	-	-	-	-	-
Order in Council Natural Areas	-	6	148	75	229
Parks and Protected Areas	-	-	-	-	-
Environmental Exclusions	**Good (ha)**	**Fair (ha)**	**Poor (ha)**	**Non Use (ha)**	**Total Area (ha)**
Riparian Area Buffers*	31	1	91	140	263
Caribou Areas					
Trumpeter Swan/Heron Areas					
TOTAL DELETIONS	386	254	1 902	9 551	12 093

*Landuse AVI & Company Data used to estimate industrial related dispositions
*Riparian Area Buffers = 100m on larger rivers and waterbodies; 60 m on small rivers.
*Roads = road data from timber companies

Table 3.4o. Administrative and Environmental Exclusions (ha) for FMU W02

Administrative Exclusions	Good (ha)	Fair (ha)	Poor (ha)	Non Use (ha)	Total Area (ha)
PNTs Restricting Grazing	703	780	9 502	12 706	23 691
Freehold/Mixed Freehold Land	19 862	15 806	21 114	71 184	127 966
Existing Grazing Dispositions	361	675	3 966	3 588	8 590
Provincial Grazing Reserves	90	135	3 021	2 740	5 986
Landuse AVI & Company Data*	81	-	-	-	81
Roads*	-	-	-	-	-
Order in Council Natural Areas	4	456	274	333	1 067
Parks and Protected Areas	-	-	3	20	23
Environmental Exclusions	**Good (ha)**	**Fair (ha)**	**Poor (ha)**	**Non Use (ha)**	**Total Area (ha)**
Riparian Area Buffers*	59	246	719	961	1 985
Caribou Areas	-	-	-	-	-
Trumpeter Swan/Heron Areas	-	-	-	-	-
TOTAL DELETIONS	21 160	18 098	38 599	91 532	169 389

*Landuse AVI & Company Data used to estimate industrial related dispositions
*Riparian Area Buffers = 100m on larger rivers and waterbodies; 60 m on small rivers.
*Roads = road data from timber companies

Table 3.5. Summary of grazing potential categories (ha), total area (ha) and net grazing potential (ha) for each FMU within the Whitecourt-Edson RGP

FMA	FMU	Good (ha)	Fair (ha)	Poor (ha)	Non-Use (ha)	Total Area (ha)	Net Grazing Potential (ha)*
Weyerhaeuser	W6	7 123	24 979	6 578	120 079	158 759	38 680
	W5	1 647	3 974	1 287	30 050	36 958	6 908
	E1	1 230	3 018	58	21 437	25 743	4 306
	E2	1 169	9 249	278	30 935	41 631	10 696
Millar Western	W11	1 171	4 828	10 909	31 532	48 440	16 908
	W13	959	22 115	3 695	30 462	57 231	26 769
Blue Ridge Lumber	W14	1 460	10 011	7 398	31 511	50 380	18 869
Hinton West Fraser	E3	1 834	9 451	187	32 623	44 095	11 472
Sundance	R13	535	3 575	289	18 672	23 071	4 399
White Area	W01	1 836	1 962	1 011	16 405	21 214	4 809
	E01	1 934	2 530	63	13 111	17 638	4 527
	S01	37	1	52	300	390	90
	S7	283	59	859	6 850	8 051	1 201
	W02	434	1 031	3 649	20 630	25 744	5 114

*Non Use includes vegetation not suitable for livestock grazing and unvegetated AVI polygons; non use (ha) were therefore not included in the estimate of net grazing potential.
*Net grazing potential = (gross grazing potential -administrative and environmental exclusions).
*Net grazing potential combined with excluded net grazing due to timber harvesting = available net grazing (Table 4).

Table 3.6. Summary of Regenerating and Planned Cutblocks within each FMU for each 10-yr sequence

FMA	FMU	1st 10-yr	2nd 10-yr	3rd 10-yr	4th 10-yr	5th 10-yr	6th 10-yr
Weyerhaeuser	W6						
	Regenerating	10 789	17 441	17 796	16 724	13 694	16 493
	Planned	19 403	18 347	14 625	15 094	17 740	14 390
	Total Cut	**30 192**	**35 788**	**32 421**	**31 818**	**31 434**	**30 883**
	W5						
	Regenerating	3 787	4 736	5 209	5 096	5 046	4 801
	Planned	5 197	5 064	5 315	4 984	5 036	3 754
	Total Cut	**8 984**	**9 800**	**10 524**	**10 080**	**10 082**	**8 555**
	E1						
	Regenerating	-	1 658	1 271	1 359	1 815	1 833
	Planned	2 585	1 789	1 908	1 936	2 355	2 112
	Total Cut	**2 585**	**3 447**	**3 179**	**3 295**	**4 170**	**3 945**
	E2						
	Regenerating	3 514	5 368	5 317	5 028	6 040	6 467
	Planned	5 535	4 828	5 606	6 235	6 499	4 583
	Total Cut	**9 049**	**10 196**	**10 923**	**11 263**	**12 539**	**11 050**
Millar Western	W11						
	Regenerating	1 670	8 975	7 581	4 849	4 324	3 604
	Planned	7 756	5 737	3 112	3 157	2 836	1 576
	Total Cut	**9 426**	**14 712**	**10 693**	**8 006**	**7 160**	**5 180**
	W13						
	Regenerating	3 385	9 904	12 823	8 732	7 114	6 234
	Planned	7 322	10 444	6 414	5 424	5 000	1 634
	Total Cut	**10 707**	**20 348**	**19 237**	**14 156**	**12 114**	**7 868**
Blue Ridge Lumber	W14						
	Regenerating	444	-	-	-	-	-
	Planned	-	-	-	-	-	-
	Total Cut	444	-	-	-	-	-
Hinton West Fraser	E3						
	Regenerating	-	-	-	-	-	-
	Planned	-	-	-	-	-	-
	Total Cut	-	-	-	-	-	-
Sundance	R13						
	Regenerating	583	3 687	-	-	-	-
	Planned	3 374	956	-	-	-	-
	Total Cut	3 957	4 643	-	-	-	-

*No spatial harvesting sequencing was available from Blue Ridge Lumber or Hinton West Fraser.
*There is no spatial harvesting sequencing for White Area land managed for sustained timber yield (W01, W01, E01, S02, S7)

Table 3.7a. Timber Harvest Impact on Net Grazing Potential and Available Net Grazing (ha and AUM) for each FMU in the 1st 10-yr Sequence

	W6	Good	Fair	Poor	Non Use	Total*
Weyerhaeuser	Net Grazing Potential (ha)	7 123	24 979	6 578	120 079	38 680
	Excluded Net Grazing Due to Timber Harvest (ha)	1 338	8 998	1 499	18 367	11 835
	Available Net Grazing (ha)*	**5 785**	**15 981**	**5 079**	**101 712**	**26 845**
	Available Net Grazing (AUM)*	**5 785**	**6 392**	**1 451**		**13 629**
	W5	**Good**	**Fair**	**Poor**	**Non Use**	**Total***
	Net Grazing Potential (ha)	1 647	3 974	1 287	28 986	6 908
	Excluded Net Grazing Due to Timber Harvest (ha)	606	2 609	511	5 258	3 726
	Available Net Grazing (ha)*	**1 041**	**1 365**	**776**	**23 728**	**3 182**
	Available Net Grazing (AUM)*	**1 041**	**546**	**222**		**1 809**
	E1	**Good**	**Fair**	**Poor**	**Non Use**	**Total***
	Net Grazing Potential (ha)	1 230	3 018	58	20 876	4 306
	Excluded Net Grazing Due to Timber Harvest (ha)	-	332	5	2 247	337
	Available Net Grazing (ha)*	**1 230**	**2 686**	**53**	**18 629**	**3 969**
	Available Net Grazing (AUM)*	**1 230**	**1 074**	**15**		**2 320**
	E2	**Good**	**Fair**	**Poor**	**Non Use**	**Total***
	Net Grazing Potential (ha)	1 169	9 249	278	27 193	10 696
	Excluded Net Grazing Due to Timber Harvest (ha)	408	4 184	27	4 431	4 619
	Available Net Grazing (ha)*	**761**	**5 065**	**251**	**22 762**	**6 077**
	Available Net Grazing (AUM)*	**761**	**2 026**	**72**		**2 859**
Millar Western	**W11**	**Good**	**Fair**	**Poor**	**Non Use**	**Total***
	Net Grazing Potential (ha)	1 171	4 828	10 909	30 541	16 908
	Excluded Net Grazing Due to Timber Harvest (ha)	-	1 730	2 185	4 808	3 915
	Available Net Grazing (ha)*	**1 171**	**3 098**	**8 724**	**25 733**	**12 993**
	Available Net Grazing (AUM)*	**1 171**	**1 239**	**2 493**		**4 903**
	W13	**Good**	**Fair**	**Poor**	**Non Use**	**Total***
	Net Grazing Potential (ha)	959	22 115	3 695	27 940	26 769

	Excluded Net Grazing Due to Timber Harvest (ha)	1	5 561	1 058	4 089	6 620
	Available Net Grazing (ha)*	**958**	**16 554**	**2 637**	**23 851**	**20 149**
	Available Net Grazing (AUM)*	**958**	**6 622**	**753**		**8 333**
Blue Ridge Lumber	**W14**	**Good**	**Fair**	**Poor**	**Non Use**	**Total***
	Net Grazing Potential (ha)	1 460	10 011	7 398	30 857	18 869
	Excluded Net Grazing Due to Timber Harvest (ha)	63	136	94	151	293
	Available Net Grazing (ha)*	**1 397**	**9 875**	**7 304**	**30 706**	**18 576**
	Available Net Grazing (AUM)*	**1 397**	**3 950**	**2 087**		**7 434**
Hinton	**E3**	**Good**	**Fair**	**Poor**	**Non Use**	**Total***
	Net Grazing Potential (ha)	1 834	9 451	187	31 642	11 472
	Excluded Net Grazing Due to Timber Harvest (ha)	166	626	21	3 366	813
	Available Net Grazing (ha)*	**1 668**	**8 825**	**166**	**28 276**	**10 659**
	Available Net Grazing (AUM)*	**1 668**	**3 530**	**47**		**5 245**
Sundance	**R13**	**Good**	**Fair**	**Poor**	**Non Use**	**Total***
	Net Grazing Potential (ha)	535	3 575	289	18 143	4 399
	Excluded Net Grazing Due to Timber Harvest (ha)	90	909	58	2740	1 057
	Available Net Grazing (ha)*	**445**	**2 666**	**231**	**15 403**	**3 342**
	Available Net Grazing (AUM)*	**445**	**1 066**	**66**		**1 577**

*Total = (good + fair + poor); non use is not included.
*Available Net Grazing (ha) = net grazing potential - excluded net grazing due to timber harvest.
*Available Net Grazing (AUM) was determined by dividing good, fair, poor by 1, 2.5 and 3.5 respectively.
*Timber harvest impact could not be estimated in Blue Ridge or Hinton West Fraser FMU because spatial harvest sequencing data was not available.
*Timber harvest impact in Sundance FMU was estimated for first two 10-yr sequences using spatial harvest sequence data provided.
*Timber harvest impact was not included for FMUs W01, W02, E01, S01 and S07 because there is no spatial harvest sequencing for the White Area.

Table 3.7b. Timber Harvest Impact on Net Grazing Potential and Available Net Grazing (ha and AUM) for each FMU in the 2nd 10-yr Sequence

	W6	Good	Fair	Poor	Non Use	Total*
Weyerhaeuser	Net Grazing Potential (ha)	7 123	24 979	6 578	120 079	38 680
	Excluded Net Grazing Due to Timber Harvest (ha)	24	9 473	2 097	24 205	11 594
	Available Net Grazing (ha)*	**7 099**	**15 506**	**4 481**	**95 874**	**27 086**
	Available Net Grazing (AUM)*	**7 099**	**6 202**	**1 280**		**14 582**
	W5	**Good**	**Fair**	**Poor**	**Non Use**	**Total***
	Net Grazing Potential (ha)	1 647	3 974	1 287	28 986	6 908
	Excluded Net Grazing Due to Timber Harvest (ha)	39	3 090	667	6 004	3 796
	Available Net Grazing (ha)*	**1 608**	**884**	**620**	**22 982**	**3 112**
	Available Net Grazing (AUM)*	**1 608**	**354**	**177**		**2 139**
	E1	**Good**	**Fair**	**Poor**	**Non Use**	**Total***
	Net Grazing Potential (ha)	1 230	3 018	58	20 876	4 306
	Excluded Net Grazing Due to Timber Harvest (ha)	-	383	5	3 058	388
	Available Net Grazing (ha)*	**1 230**	**2 635**	**53**	**17 818**	**3 918**
	Available Net Grazing (AUM)*	**1 230**	**1 054**	**15**		**2 299**
	E2	**Good**	**Fair**	**Poor**	**Non Use**	**Total***
	Net Grazing Potential (ha)	1 169	9 249	278	27 193	10 696
	Excluded Net Grazing Due to Timber Harvest (ha)	142	3 818	57	6 179	4 017
	Available Net Grazing (ha)*	**1 027**	**5 431**	**221**	**21 014**	**6 679**
	Available Net Grazing (AUM)*	**1 027**	**2 172**	**63**		**3 263**
Millar Western	**W11**	**Good**	**Fair**	**Poor**	**Non Use**	**Total***
	Net Grazing Potential (ha)	1 171	4 828	10 909	30 541	16 908
	Excluded Net Grazing Due to Timber Harvest (ha)	-	2 396	4 828	6 091	7 224
	Available Net Grazing (ha)*	**1 171**	**2 432**	**6 081**	**24 450**	**9 684**
	Available Net Grazing (AUM)*	**1 171**	**973**	**1 737**		**3 881**
	W13	**Good**	**Fair**	**Poor**	**Non Use**	**Total***
	Net Grazing Potential (ha)	959	22 115	3 695	27 940	26 769
	Excluded Net Grazing Due to Timber Harvest (ha)	-	8 696	1 861	9 794	10 557
	Available Net Grazing (ha)*	**959**	**13 419**	**1 834**	**18 146**	**16 212**
	Available Net Grazing (AUM)*	**959**	**5 368**	**524**		**6 851**
Blue Ridge Lumber	**W14**	**Good**	**Fair**	**Poor**	**Non Use**	**Total***
	Net Grazing Potential (ha)	1 460	10 011	7 398	30 857	18 869
	Excluded Net Grazing Due to Timber Harvest (ha)	-	-	-	-	-
	Available Net Grazing (ha)*	**1 460**	**10 011**	**7 398**	**30 857**	**18 869**
	Available Net Grazing (AUM)*	**1 460**	**4 004**	**2 114**		**7 578**

	E3	Good	Fair	Poor	Non Use	Total*
Hinton	Net Grazing Potential (ha)	1 834	9 451	187	31 642	11 472
	Excluded Net Grazing Due to Timber Harvest (ha)	-	-	-	-	-
	Available Net Grazing (ha)*	**1 834**	**9 451**	**187**	**31 642**	**11 472**
	Available Net Grazing (AUM)*	**1 834**	**3 780**	**53**		**5 668**
	R13	**Good**	**Fair**	**Poor**	**Non Use**	**Total***
Sundance	Net Grazing Potential (ha)	535	3 575	289	18 143	4 399
	Excluded Net Grazing Due to Timber Harvest (ha)	-	1 361	59	3 222	1 420
	Available Net Grazing (ha)*	**535**	**2 214**	**230**	**14 921**	**2 979**
	Available Net Grazing (AUM)*	**535**	**886**	**66**		**1 486**

*Total = (good + fair + poor); non use is not included.
*Available Net Grazing (ha) = net grazing potential - excluded net grazing due to timber harvest.
*Available Net Grazing (AUM) was determined by dividing good, fair, poor by 1, 2.5 and 3.5 respectively.
*Timber harvest impact could not be estimated in Blue Ridge or Hinton West Fraser FMU because spatial harvest sequencing data was not available.
*Timber harvest impact in Sundance FMU was estimated for first two 10-yr sequences using spatial harvest sequence data provided.
*Timber harvest impact was not included for FMUs W01, W02, E01, S01 and S07 because there is no spatial harvest sequencing for the White Area.

Table 3.7c. Timber Harvest Impact on Net Grazing Potential and Available Net Grazing (ha and AUM) for each FMU in the 3rd 10-yr Sequence

Weyerhaeuser	**W6**	**Good**	**Fair**	**Poor**	**Non Use**	**Total***
	Net Grazing Potential (ha)	7 123	24 979	6 578	120 079	38 680
	Excluded Net Grazing Due to Timber Harvest (ha)	-	9 132	1 694	21 594	10 826
	Available Net Grazing (ha)*	**7 123**	**15 847**	**4 884**	**98 485**	**27 854**
	Available Net Grazing (AUM)*	**7 123**	**6 339**	**1 395**		**14 857**
	W5	**Good**	**Fair**	**Poor**	**Non Use**	**Total***
	Net Grazing Potential (ha)	1 647	3 974	1 287	28 986	6 908
	Excluded Net Grazing Due to Timber Harvest (ha)	-	3 651	453	6 419	4 104
	Available Net Grazing (ha)*	**1 647**	**323**	**834**	**22 567**	**2 804**
	Available Net Grazing (AUM)*	**1 647**	**129**	**238**		**2 014**
	E1	**Good**	**Fair**	**Poor**	**Non Use**	**Total***
	Net Grazing Potential (ha)	1 230	3 018	58	20 876	4 306
	Excluded Net Grazing Due to Timber Harvest (ha)	-	351	5	2 824	356
	Available Net Grazing (ha)*	**1 230**	**2 667**	**53**	**18 052**	**3 950**
	Available Net Grazing (AUM)*	**1 230**	**1 067**	**15**		**2 312**
	E2	**Good**	**Fair**	**Poor**	**Non Use**	**Total***
	Net Grazing Potential (ha)	1 169	9 249	278	27 193	10 696
	Excluded Net Grazing Due to Timber Harvest (ha)	-	4 166	52	6 705	4 218
	Available Net Grazing (ha)*	**1 169**	**5 083**	**226**	**20 488**	**6 478**
	Available Net Grazing (AUM)*	**1 169**	**2 033**	**65**		**3 267**
Millar Western	**W11**	**Good**	**Fair**	**Poor**	**Non Use**	**Total***
	Net Grazing Potential (ha)	1 171	4 828	10 909	30 541	16 908
	Excluded Net Grazing Due to Timber Harvest (ha)	-	1 211	5 124	3 243	6 335
	Available Net Grazing (ha)*	**1 171**	**3 617**	**5 785**	**27 298**	**10 573**
	Available Net Grazing (AUM)*	**1 171**	**1 447**	**1 653**		**4 271**
	W13	**Good**	**Fair**	**Poor**	**Non Use**	**Total***
	Net Grazing Potential (ha)	959	22 115	3 695	27 940	26 769
	Excluded Net Grazing Due to Timber Harvest (ha)	-	7 672	1 410	10 149	9 082
	Available Net Grazing (ha)*	**959**	**14 443**	**2 285**	**17 791**	**17 687**
	Available Net Grazing (AUM)*	**959**	**5 777**	**653**		**7 389**
Blue Ridge Lumber	**W14**	**Good**	**Fair**	**Poor**	**Non Use**	**Total***
	Net Grazing Potential (ha)	1 460	10 011	7 398	30 857	18 869
	Excluded Net Grazing Due to Timber Harvest (ha)	-	-	-	-	-
	Available Net Grazing (ha)*	**1 460**	**10 011**	**7 398**	**30 857**	**18 869**
	Available Net Grazing (AUM)*	**1 460**	**4 004**	**2 114**		**7 578**

	E3	Good	Fair	Poor	Non Use	Total*
Hinton	Net Grazing Potential (ha)	1 834	9 451	187	31 642	11 472
	Excluded Net Grazing Due to Timber Harvest (ha)	-	-	-	-	-
	Available Net Grazing (ha)*	**1 834**	**9 451**	**187**	**31 642**	**11 472**
	Available Net Grazing (AUM)*	**1 834**	**3 780**	**53**		**5 668**
	R13	**Good**	**Fair**	**Poor**	**Non Use**	**Total***
Sundance	Net Grazing Potential (ha)	535	3 575	289	18 143	4 399
	Excluded Net Grazing Due to Timber Harvest (ha)	-	-	-	-	-
	Available Net Grazing (ha)*	**535**	**3 575**	**289**	**18 143**	**4 399**
	Available Net Grazing (AUM)*	**535**	**1 430**	**83**		**2 048**

*Total = (good + fair + poor); non use is not included.
*Available Net Grazing (ha) = net grazing potential - excluded net grazing due to timber harvest.
*Available Net Grazing (AUM) was determined by dividing good, fair, poor by 1, 2.5 and 3.5 respectively.
*Timber harvest impact could not be estimated in Blue Ridge or Hinton West Fraser FMU because spatial harvest sequencing data was not available.
*Timber harvest impact in Sundance FMU was estimated for first two 10-yr sequences using spatial harvest sequence data provided.
*Timber harvest impact was not included for FMUs W01, W02, E01, S01 and S07 because there is no spatial harvest sequencing for the White Area.

Table 3.7d. Timber Harvest Impact on Net Grazing Potential and Available Net Grazing (ha and AUM) for each FMU in the 4th 10-yr Sequence

Weyerhaeuser	**W6**	**Good**	**Fair**	**Poor**	**Non Use**	**Total***
	Net Grazing Potential (ha)	7 123	24 979	6 578	120 079	38 680
	Excluded Net Grazing Due to Timber Harvest (ha)	57	8 523	1 856	21 382	10 436
	Available Net Grazing (ha)*	**7 066**	**16 456**	**4 722**	**98 697**	**28 244**
	Available Net Grazing (AUM)*	**7 066**	**6 582**	**1 349**		**14 998**
	W5	**Good**	**Fair**	**Poor**	**Non Use**	**Total***
	Net Grazing Potential (ha)	1 647	3 974	1 287	28 986	6 908
	Excluded Net Grazing Due to Timber Harvest (ha)	16	3 130	440	6 493	3 586
	Available Net Grazing (ha)*	**1 631**	**844**	**847**	**22 493**	**3 322**
	Available Net Grazing (AUM)*	**1 631**	**338**	**242**		**2 211**
	E1	**Good**	**Fair**	**Poor**	**Non Use**	**Total***
	Net Grazing Potential (ha)	1 230	3 018	58	20 876	4 306
	Excluded Net Grazing Due to Timber Harvest (ha)	29	480	5	2 780	514
	Available Net Grazing (ha)*	**1 201**	**2 538**	**53**	**18 096**	**3 792**
	Available Net Grazing (AUM)*	**1 201**	**1 015**	**15**		**2 231**
	E2	**Good**	**Fair**	**Poor**	**Non Use**	**Total***
	Net Grazing Potential (ha)	1 169	9 249	278	27 193	10 696
	Excluded Net Grazing Due to Timber Harvest (ha)	-	4 437	100	6 726	4 537
	Available Net Grazing (ha)*	**1 169**	**4 812**	**178**	**20 467**	**6 159**
	Available Net Grazing (AUM)*	**1 169**	**1 925**	**51**		**3 145**
Millar Western	**W11**	**Good**	**Fair**	**Poor**	**Non Use**	**Total***
	Net Grazing Potential (ha)	1 171	4 828	10 909	30 541	16 908
	Excluded Net Grazing Due to Timber Harvest (ha)	-	1 353	3 300	3 068	4 653
	Available Net Grazing (ha)*	**1 171**	**3 475**	**7 609**	**27 473**	**12 255**
	Available Net Grazing (AUM)*	**1 171**	**1 390**	**2 174**		**4 735**
	W13	**Good**	**Fair**	**Poor**	**Non Use**	**Total***
	Net Grazing Potential (ha)	959	22 115	3 695	27 940	26 769
	Excluded Net Grazing Due to Timber Harvest (ha)	-	7 301	1 088	5 767	8 389
	Available Net Grazing (ha)*	**959**	**14 814**	**2 607**	**22 173**	**18 380**
	Available Net Grazing (AUM)*	**959**	**5 926**	**745**		**7 629**
Blue Ridge Lumber	**W14**	**Good**	**Fair**	**Poor**	**Non Use**	**Total***
	Net Grazing Potential (ha)	1 460	10 011	7 398	30 857	18 869
	Excluded Net Grazing Due to Timber Harvest (ha)	-	-	-	-	-
	Available Net Grazing (ha)*	**1 460**	**10 011**	**7 398**	**30 857**	**18 869**
	Available Net Grazing (AUM)*	**1 460**	**4 004**	**2 114**		**7 578**

	E3	Good	Fair	Poor	Non Use	Total*
Hinton	Net Grazing Potential (ha)	1 834	9 451	187	31 642	11 472
	Excluded Net Grazing Due to Timber Harvest (ha)	-	-	-	-	-
	Available Net Grazing (ha)*	**1 834**	**9 451**	**187**	**31 642**	**11 472**
	Available Net Grazing (AUM)*	**1 834**	**3 780**	**53**		**5 668**
	R13	**Good**	**Fair**	**Poor**	**Non Use**	**Total***
Sundance	Net Grazing Potential (ha)	535	3 575	289	18 143	4 399
	Excluded Net Grazing Due to Timber Harvest (ha)	-	-	-	-	-
	Available Net Grazing (ha)*	**535**	**3 575**	**289**	**18 143**	**4 399**
	Available Net Grazing (AUM)*	**535**	**1 430**	**83**		**2 048**

*Total = (good + fair + poor); non use is not included.
*Available Net Grazing (ha) = net grazing potential - excluded net grazing due to timber harvest.
*Available Net Grazing (AUM) was determined by dividing good, fair, poor by 1, 2.5 and 3.5 respectively.
*Timber harvest impact could not be estimated in Blue Ridge or Hinton West Fraser FMU because spatial harvest sequencing data was not available.
*Timber harvest impact in Sundance FMU was estimated for first two 10-yr sequences using spatial harvest sequence data provided.
*Timber harvest impact was not included for FMUs W01, W02, E01, S01 and S07 because there is no spatial harvest sequencing for the White Area.

Table 3.7e. Timber Harvest Impact on Net Grazing Potential and Available Net Grazing (ha and AUM) for each FMU in the 5th 10-yr Sequence

Weyerhaeuser	**W6**	**Good**	**Fair**	**Poor**	**Non Use**	**Total***
	Net Grazing Potential (ha)	7 123	24 979	6 578	120 079	38 680
	Excluded Net Grazing Due to Timber Harvest (ha)	72	8 168	1 629	21 577	9 869
	Available Net Grazing (ha)*	**7 051**	**16 811**	**4 949**	**98 502**	**28 811**
	Available Net Grazing (AUM)*	**7 051**	**6 724**	**1 414**		**15 189**
	W5	**Good**	**Fair**	**Poor**	**Non Use**	**Total***
	Net Grazing Potential (ha)	1 647	3 974	1 287	28 986	6 908
	Excluded Net Grazing Due to Timber Harvest (ha)	58	2 809	384	6 831	3 251
	Available Net Grazing (ha)*	**1 589**	**1 165**	**903**	**22 155**	**3 657**
	Available Net Grazing (AUM)*	**1 589**	**466**	**258**		**2 313**
	E1	**Good**	**Fair**	**Poor**	**Non Use**	**Total***
	Net Grazing Potential (ha)	1 230	3 018	58	20 876	4 306
	Excluded Net Grazing Due to Timber Harvest (ha)	115	994	6	3 055	1 115
	Available Net Grazing (ha)*	**1 115**	**2 024**	**52**	**17 821**	**3 191**
	Available Net Grazing (AUM)*	**1 115**	**810**	**15**		**1 939**
	E2	**Good**	**Fair**	**Poor**	**Non Use**	**Total***
	Net Grazing Potential (ha)	1 169	9 249	278	27 193	10 696
	Excluded Net Grazing Due to Timber Harvest (ha)	1	5 549	118	6 871	5 668
	Available Net Grazing (ha)*	**1 168**	**3 700**	**160**	**20 322**	**5 028**
	Available Net Grazing (AUM)*	**1 168**	**1 480**	**46**		**2 694**
Millar Western	**W11**	**Good**	**Fair**	**Poor**	**Non Use**	**Total***
	Net Grazing Potential (ha)	1 171	4 828	10 909	30 541	16 908
	Excluded Net Grazing Due to Timber Harvest (ha)	-	1 310	2 720	2 992	4 030
	Available Net Grazing (ha)*	**1 171**	**3 518**	**8 189**	**27 549**	**12 878**
	Available Net Grazing (AUM)*	**1 171**	**1 407**	**2 340**		**4 918**
	W13	**Good**	**Fair**	**Poor**	**Non Use**	**Total***
	Net Grazing Potential (ha)	959	22 115	3 695	27 940	26 769
	Excluded Net Grazing Due to Timber Harvest (ha)	63	7 098	1 002	3 952	8 163
	Available Net Grazing (ha)*	**896**	**15 017**	**2 693**	**23 988**	**18 606**
	Available Net Grazing (AUM)*	**896**	**6 007**	**769**		**7 672**
Blue Ridge Lumber	**W14**	**Good**	**Fair**	**Poor**	**Non Use**	**Total***
	Net Grazing Potential (ha)	1 460	10 011	7 398	30 857	18 869
	Excluded Net Grazing Due to Timber Harvest (ha)	-	-	-	-	-
	Available Net Grazing (ha)*	**1 460**	**10 011**	**7 398**	**30 857**	**18 869**
	Available Net Grazing (AUM)*	**1 460**	**4 004**	**2 114**		**7 578**

	E3	Good	Fair	Poor	Non Use	Total*
Hinton	Net Grazing Potential (ha)	1 834	9 451	187	31 642	11 472
	Excluded Net Grazing Due to Timber Harvest (ha)	-	-	-	-	-
	Available Net Grazing (ha)*	**1 834**	**9 451**	**187**	**31 642**	**11 472**
	Available Net Grazing (AUM)*	**1 834**	**3 780**	**53**		**5 668**
	R13	**Good**	**Fair**	**Poor**	**Non Use**	**Total***
Sundance	Net Grazing Potential (ha)	535	3 575	289	18 143	4 399
	Excluded Net Grazing Due to Timber Harvest (ha)	-	-	-	-	-
	Available Net Grazing (ha)*	**535**	**3 575**	**289**	**18 143**	**4 399**
	Available Net Grazing (AUM)*	**535**	**1 430**	**83**		**2 048**

*Total = (good + fair + poor); non use is not included.
*Available Net Grazing (ha) = net grazing potential - excluded net grazing due to timber harvest.
*Available Net Grazing (AUM) was determined by dividing good, fair, poor by 1, 2.5 and 3.5 respectively.
*Timber harvest impact could not be estimated in Blue Ridge or Hinton West Fraser FMU because spatial harvest sequencing data was not available.
*Timber harvest impact in Sundance FMU was estimated for first two 10-yr sequences using spatial harvest sequence data provided.
*Timber harvest impact was not included for FMUs W01, W02, E01, S01 and S07 because there is no spatial harvest sequencing for the White Area.

Table 3.7f. Timber Harvest Impact on Net Grazing Potential and Available Net Grazing (ha and AUM) for each FMU in the 6th 10-yr Sequence

Weyerhaeuser	**W6**	**Good**	**Fair**	**Poor**	**Non Use**	**Total***
	Net Grazing Potential (ha)	7 123	24 979	6 578	120 079	38 680
	Excluded Net Grazing Due to Timber Harvest (ha)	113	7 699	1 334	21 736	9 146
	Available Net Grazing (ha)*	**7 010**	**17 280**	**5 244**	**98 343**	**29 534**
	Available Net Grazing (AUM)*	**7 010**	**6 912**	**1 498**		**15 420**
	W5	**Good**	**Fair**	**Poor**	**Non Use**	**Total***
	Net Grazing Potential (ha)	1 647	3 974	1 287	28 986	6 908
	Excluded Net Grazing Due to Timber Harvest (ha)	58	2 265	360	5 880	2 683
	Available Net Grazing (ha)*	**1 589**	**1 709**	**927**	**23 106**	**4 225**
	Available Net Grazing (AUM)*	**1 589**	**684**	**265**		**2 537**
	E1	**Good**	**Fair**	**Poor**	**Non Use**	**Total***
	Net Grazing Potential (ha)	1 230	3 018	58	20 876	4 306
	Excluded Net Grazing Due to Timber Harvest (ha)	166	1 085	6	2 689	1 257
	Available Net Grazing (ha)*	**1 064**	**1 933**	**52**	**18 187**	**3 049**
	Available Net Grazing (AUM)*	**1 064**	**773**	**15**		**1 852**
	E2	**Good**	**Fair**	**Poor**	**Non Use**	**Total***
	Net Grazing Potential (ha)	1 169	9 249	278	27 193	10 696
	Excluded Net Grazing Due to Timber Harvest (ha)	2	4 729	136	6 184	4 867
	Available Net Grazing (ha)*	**1 167**	**4 520**	**142**	**21 009**	**5 829**
	Available Net Grazing (AUM)*	**1 167**	**1 808**	**41**		**3 016**
Millar Western	**W11**	**Good**	**Fair**	**Poor**	**Non Use**	**Total***
	Net Grazing Potential (ha)	1 171	4 828	10 909	30 541	16 908
	Excluded Net Grazing Due to Timber Harvest (ha)	46	695	2 258	2 032	2 999
	Available Net Grazing (ha)*	**1 125**	**4 133**	**8 651**	**28 509**	**13 909**
	Available Net Grazing (AUM)*	**1 125**	**1 653**	**2 472**		**5 250**
	W13	**Good**	**Fair**	**Poor**	**Non Use**	**Total***
	Net Grazing Potential (ha)	959	22 115	3 695	27 940	26 769
	Excluded Net Grazing Due to Timber Harvest (ha)	89	4 751	658	2 370	5 498
	Available Net Grazing (ha)*	**870**	**17 364**	**3 037**	**25 570**	**21 271**
	Available Net Grazing (AUM)*	**870**	**6 946**	**868**		**8 683**
Blue Ridge Lumber	**W14**	**Good**	**Fair**	**Poor**	**Non Use**	**Total***
	Net Grazing Potential (ha)	1 460	10 011	7 398	30 857	18 869
	Excluded Net Grazing Due to Timber Harvest (ha)	-	-	-	-	-
	Available Net Grazing (ha)*	**1 460**	**10 011**	**7 398**	**30 857**	**18 869**
	Available Net Grazing (AUM)*	**1 460**	**4 004**	**2 114**		**7 578**

	E3	Good	Fair	Poor	Non Use	Total*
Hinton	Net Grazing Potential (ha)	1 834	9 451	187	31 642	11 472
	Excluded Net Grazing Due to Timber Harvest (ha)	-	-	-	-	-
	Available Net Grazing (ha)*	**1 834**	**9 451**	**187**	**31 642**	**11 472**
	Available Net Grazing (AUM)*	**1 834**	**3 780**	**53**		**5 668**
	R13	**Good**	**Fair**	**Poor**	**Non Use**	**Total***
Sundance	Net Grazing Potential (ha)	535	3 575	289	18 143	4 399
	Excluded Net Grazing Due to Timber Harvest (ha)	-	-	-	-	-
	Available Net Grazing (ha)*	**535**	**3 575**	**289**	**18 143**	**4 399**
	Available Net Grazing (AUM)*	**535**	**1 430**	**83**		**2 048**

*Total = (good + fair + poor); non use is not included.
*Available Net Grazing (ha) = net grazing potential - excluded net grazing due to timber harvest.
*Available Net Grazing (AUM) was determined by dividing good, fair, poor by 1, 2.5 and 3.5 respectively.
*Timber harvest impact could not be estimated in Blue Ridge or Hinton West Fraser FMU because spatial harvest sequencing data was not available.
*Timber harvest impact in Sundance FMU was estimated for first two 10-yr sequences using spatial harvest sequence data provided.
*Timber harvest impact was not included for FMUs W01, W02, E01, S01 and S07 because there is no spatial harvest sequencing for the White Area.

Table 3.8a. Timber Harvest Impact on Net Grazing Potential (ha) and Available Net Grazing (ha and AUM) for FMU W6 through all six 10-yr sequences

1st 10-yr Sequence	Good	Fair	Poor	Non Use	Total*
Net Grazing Potential (ha)	7 123	24 979	6 578	120 079	38 680
Excluded Net Grazing Due to Timber Harvest (ha)	1 338	8 998	1 499	18 367	11 835
Available Net Grazing (ha)	**5 785**	**15 981**	**5 079**	**101 712**	**26 845**
Available Grazing (AUM)	**5 785**	**6 392**	**1 451**		**13 629**
2nd 10-yr Sequence	**Good**	**Fair**	**Poor**	**Non Use**	**Total***
Net Grazing Potential (ha)	7 123	24 979	6 578	120 079	38 680
Excluded Net Grazing Due to Timber Harvest (ha)	24	9 473	2 097	24 205	11 594
Available Net Grazing (ha)	**7 099**	**15 506**	**4 481**	**95 874**	**27 086**
Available Grazing (AUM)	**7 099**	**6 202**	**1 280**		**14 582**
3rd 10-yr Sequence	**Good**	**Fair**	**Poor**	**Non Use**	**Total***
Net Grazing Potential (ha)	7 123	24 979	6 578	120 079	38 680
Excluded Net Grazing Due to Timber Harvest (ha)	-	9 132	1 694	21 594	10 826
Available Net Grazing (ha)	**7 123**	**15 847**	**4 884**	**98 485**	**27 854**
Available Grazing (AUM)	**7 123**	**6 339**	**1 395**		**14 857**
4th 10-yr Sequence	**Good**	**Fair**	**Poor**	**Non Use**	**Total***
Net Grazing Potential (ha)	7 123	24 979	6 578	120 079	38 680
Excluded Net Grazing Due to Timber Harvest (ha)	57	8 523	1 856	21 382	10 436
Available Net Grazing (ha)	**7 066**	**16 456**	**4 722**	**98 697**	**28 244**
Available Grazing (AUM)	**7 066**	**6 582**	**1 349**		**14 998**
5th 10-yr Sequence	**Good**	**Fair**	**Poor**	**Non Use**	**Total***
Net Grazing Potential (ha)	7 123	24 979	6 578	120 079	38 680
Excluded Net Grazing Due to Timber Harvest (ha)	72	8 168	1 629	21 577	9 869
Available Net Grazing (ha)	**7 051**	**16 811**	**4 949**	**98 502**	**28 811**
Available Grazing (AUM)	**7 051**	**6 724**	**1 414**		**15 189**
6th 10-yr Sequence	**Good**	**Fair**	**Poor**	**Non Use**	**Total***
Net Grazing Potential (ha)	7 123	24 979	6 578	120 079	38 680
Excluded Net Grazing Due to Timber Harvest (ha)	113	7 699	1 334	21 736	9 146
Available Net Grazing (ha)	**7 010**	**17 280**	**5 244**	**98 343**	**29 534**
Available Grazing (AUM)	**7 010**	**6 912**	**1 498**		**15 420**

*Total = (good + fair + poor); non use is not included
*Available Net Grazing (ha) = net grazing potential - excluded net grazing due to timber harvest.
*Available Net Grazing (AUM) was determined by dividing good, fair, poor by 1, 2.5 and 3.5 respectively.

Table 3.8b. Timber Harvest Impact on Net Grazing Potential (ha) and Available Net Grazing (ha and AUM) for FMU W5 through all six 10-yr sequences

1st 10-yr Sequence	Good	Fair	Poor	Non Use	Total*
Net Grazing Potential (ha)	1 647	3 974	1 287	28 986	6 908
Excluded Net Grazing Due to Timber Harvest (ha)	606	2 609	511	5 258	3 726
Available Net Grazing (ha)	**1 041**	**1 365**	**776**	**23 728**	**3 182**
Available Grazing (AUM)	**1 041**	**546**	**222**		**1 809**
2nd 10-yr Sequence	**Good**	**Fair**	**Poor**	**Non Use**	**Total***
Net Grazing Potential (ha)	1 647	3 974	1 287	28 986	6 908
Excluded Net Grazing Due to Timber Harvest (ha)	39	3 090	667	6 004	3 796
Available Net Grazing (ha)	**1 608**	**884**	**620**	**22 982**	**3 112**
Available Grazing (AUM)	**1 608**	**354**	**177**		**2 139**
3rd 10-yr Sequence	**Good**	**Fair**	**Poor**	**Non Use**	**Total***
Net Grazing Potential (ha)	1 647	3 974	1 287	28 986	6 908
Excluded Net Grazing Due to Timber Harvest (ha)	-	3 651	453	6 419	4 104
Available Net Grazing (ha)	**1 647**	**323**	**834**	**22 567**	**2 804**
Available Grazing (AUM)	**1 647**	**129**	**238**		**2 014**
4th 10-yr Sequence	**Good**	**Fair**	**Poor**	**Non Use**	**Total***
Net Grazing Potential (ha)	1 647	3 974	1 287	28 986	6 908
Excluded Net Grazing Due to Timber Harvest (ha)	16	3 130	440	6 493	3 586
Available Net Grazing (ha)	**1 631**	**844**	**847**	**22 493**	**3 322**
Available Grazing (AUM)	**1 631**	**338**	**242**		**2 211**
5th 10-yr Sequence	**Good**	**Fair**	**Poor**	**Non Use**	**Total***
Net Grazing Potential (ha)	1 647	3 974	1 287	28 986	6 908
Excluded Net Grazing Due to Timber Harvest (ha)	58	2 809	384	6 831	3 251
Available Net Grazing (ha)	**1 589**	**1 165**	**903**	**22 155**	**3 657**
Available Grazing (AUM)	**1 589**	**466**	**258**		**2 313**
6th 10-yr Sequence	**Good**	**Fair**	**Poor**	**Non Use**	**Total***
Net Grazing Potential (ha)	1 647	3 974	1 287	28 986	6 908
Excluded Net Grazing Due to Timber Harvest (ha)	58	2 265	360	5 880	2 683
Available Net Grazing (ha)	**1 589**	**1 709**	**927**	**23 106**	**4 225**
Available Grazing (AUM)	**1 589**	**684**	**265**		**2 537**

*Total = (good + fair + poor); non use is not included
*Available Net Grazing (ha) = net grazing potential - excluded net grazing due to timber harvest.
*Available Net Grazing (AUM) was determined by dividing good, fair, poor by 1, 2.5 and 3.5 respectively.

Table 3.8c. Timber Harvest Impact on Net Grazing Potential (ha) and Available Net Grazing (ha and AUM) for FMU E1 through all six 10-yr sequences

1st 10-yr Sequence	Good	Fair	Poor	Non Use	Total*
Net Grazing Potential (ha)	1 230	3 018	58	20 876	4 306
Excluded Net Grazing Due to Timber Harvest (ha)	-	332	5	2 247	337
Available Net Grazing (ha)	**1 230**	**2 686**	**53**	**18 629**	**3 969**
Available Grazing (AUM)	**1 230**	**1 074**	**15**		**2 320**
2nd 10-yr Sequence	**Good**	**Fair**	**Poor**	**Non Use**	**Total***
Net Grazing Potential (ha)	1 230	3 018	58	20 876	4 306
Excluded Net Grazing Due to Timber Harvest (ha)	-	383	5	3 058	388
Available Net Grazing (ha)	**1 230**	**2 635**	**53**	**17 818**	**3 918**
Available Grazing (AUM)	**1 230**	**1 054**	**15**		**2 299**
3rd 10-yr Sequence	**Good**	**Fair**	**Poor**	**Non Use**	**Total***
Net Grazing Potential (ha)	1 230	3 018	58	20 876	4 306
Excluded Net Grazing Due to Timber Harvest (ha)	-	351	5	2 824	356
Available Net Grazing (ha)	**1 230**	**2 667**	**53**	**18 052**	**3 950**
Available Grazing (AUM)	**1 230**	**1 067**	**15**		**2 312**
4th 10-yr Sequence	**Good**	**Fair**	**Poor**	**Non Use**	**Total***
Net Grazing Potential (ha)	1 230	3 018	58	20 876	4 306
Excluded Net Grazing Due to Timber Harvest (ha)	29	480	5	2 780	514
Available Net Grazing (ha)	**1 201**	**2 538**	**53**	**18 096**	**3 792**
Available Grazing (AUM)	**1 201**	**1 015**	**15**		**2 231**
5th 10-yr Sequence	**Good**	**Fair**	**Poor**	**Non Use**	**Total***
Net Grazing Potential (ha)	1 230	3 018	58	20 876	4 306
Excluded Net Grazing Due to Timber Harvest (ha)	115	994	6	3 055	1 115
Available Net Grazing (ha)	**1 115**	**2 024**	**52**	**17 821**	**3 191**
Available Grazing (AUM)	**1 115**	**810**	**15**		**1 939**
6th 10-yr Sequence	**Good**	**Fair**	**Poor**	**Non Use**	**Total***
Net Grazing Potential (ha)	1 230	3 018	58	20 876	4 306
Excluded Net Grazing Due to Timber Harvest (ha)	166	1 085	6	2 689	1 257
Available Net Grazing (ha)	**1 064**	**1 933**	**52**	**18 187**	**3 049**
Available Grazing (AUM)	**1 064**	**773**	**15**		**1 852**

*Total = (good + fair + poor); non use is not included
*Available Net Grazing (ha) = net grazing potential - excluded net grazing due to timber harvest.
*Available Net Grazing (AUM) was determined by dividing good, fair, poor by 1, 2.5 and 3.5 respectively.

Table 3.8d. Timber Harvest Impact on Net Grazing Potential (ha) and Available Net Grazing (ha and AUM) for FMU E2 through all six 10-yr sequences

1st 10-yr Sequence	Good	Fair	Poor	Non Use	Total*
Net Grazing Potential (ha)	1 169	9 249	278	27 193	10 696
Excluded Net Grazing Due to Timber Harvest (ha)	408	4 184	27	4 431	4 619
Available Net Grazing (ha)	**761**	**5 065**	**251**	**22 762**	**6 077**
Available Grazing (AUM)	**761**	**2 026**	**72**		**2 859**
2nd 10-yr Sequence	**Good**	**Fair**	**Poor**	**Non Use**	**Total***
Net Grazing Potential (ha)	1 169	9 249	278	27 193	10 696
Excluded Net Grazing Due to Timber Harvest (ha)	142	3 818	57	6 179	4 017
Available Net Grazing (ha)	**1 027**	**5 431**	**221**	**21 014**	**6 679**
Available Grazing (AUM)	**1 027**	**2 172**	**63**		**3 263**
3rd 10-yr Sequence	**Good**	**Fair**	**Poor**	**Non Use**	**Total***
Net Grazing Potential (ha)	1 169	9 249	278	27 193	10 696
Excluded Net Grazing Due to Timber Harvest (ha)	-	4 166	52	6 705	4 218
Available Net Grazing (ha)	**1 169**	**5 083**	**226**	**20 488**	**6 478**
Available Grazing (AUM)	**1 169**	**2 033**	**65**		**3 267**
4th 10-yr Sequence	**Good**	**Fair**	**Poor**	**Non Use**	**Total***
Net Grazing Potential (ha)	1 169	9 249	278	27 193	10 696
Excluded Net Grazing Due to Timber Harvest (ha)	-	4 437	100	6 726	4 537
Available Net Grazing (ha)	**1 169**	**4 812**	**178**	**20 467**	**6 159**
Available Grazing (AUM)	**1 169**	**1 925**	**51**		**3 145**
5th 10-yr Sequence	**Good**	**Fair**	**Poor**	**Non Use**	**Total***
Net Grazing Potential (ha)	1 169	9 249	278	27 193	10 696
Excluded Net Grazing Due to Timber Harvest (ha)	1	5 549	118	6 871	5 668
Available Net Grazing (ha)	**1 168**	**3 700**	**160**	**20 322**	**5 028**
Available Grazing (AUM)	**1 168**	**1 480**	**46**		**2 694**
6th 10-yr Sequence	**Good**	**Fair**	**Poor**	**Non Use**	**Total***
Net Grazing Potential (ha)	1 169	9 249	278	27 193	10 696
Excluded Net Grazing Due to Timber Harvest (ha)	2	4 729	136	6 184	4 867
Available Net Grazing (ha)	**1 167**	**4 520**	**142**	**21 009**	**5 829**
Available Grazing (AUM)	**1 167**	**1 808**	**41**		**3 016**

*Total = (good + fair + poor); non use is not included
*Available Net Grazing (ha) = net grazing potential - excluded net grazing due to timber harvest.
*Available Net Grazing (AUM) was determined by dividing good, fair, poor by 1, 2.5 and 3.5 respectively.

Table 3.8e. Timber Harvest Impact on Net Grazing Potential (ha) and Available Net Grazing (ha and AUM) for FMU W11 through all six 10-yr sequences

1st 10-yr Sequence	Good	Fair	Poor	Non Use	Total*
Net Grazing Potential (ha)	1 171	4 828	10 909	30 541	16 908
Excluded Net Grazing Due to Timber Harvest (ha)	-	1 730	2 185	4 808	3 915
Available Net Grazing (ha)	**1 171**	**3 098**	**8 724**	**25 733**	**12 993**
Available Grazing (AUM)	**1 171**	**1 239**	**2 493**		**4 903**
2nd 10-yr Sequence	**Good**	**Fair**	**Poor**	**Non Use**	**Total***
Net Grazing Potential (ha)	1 171	4 828	10 909	30 541	16 908
Excluded Net Grazing Due to Timber Harvest (ha)	-	2 396	4 828	6 091	7 224
Available Net Grazing (ha)	**1 171**	**2 432**	**6 081**	**24 450**	**9 684**
Available Grazing (AUM)	**1 171**	**973**	**1 737**		**3 881**
3rd 10-yr Sequence	**Good**	**Fair**	**Poor**	**Non Use**	**Total***
Net Grazing Potential (ha)	1 171	4 828	10 909	30 541	16 908
Excluded Net Grazing Due to Timber Harvest (ha)	-	1 211	5 124	3 243	6 335
Available Net Grazing (ha)	**1 171**	**3 617**	**5 785**	**27 298**	**10 573**
Available Grazing (AUM)	**1 171**	**1 447**	**1 653**		**4 271**
4th 10-yr Sequence	**Good**	**Fair**	**Poor**	**Non Use**	**Total***
Net Grazing Potential (ha)	1 171	4 828	10 909	30 541	16 908
Excluded Net Grazing Due to Timber Harvest (ha)	-	1 353	3 300	3 068	4 653
Available Net Grazing (ha)	**1 171**	**3 475**	**7 609**	**27 473**	**12 255**
Available Grazing (AUM)	**1 171**	**1 390**	**2 174**		**4 735**
5th 10-yr Sequence	**Good**	**Fair**	**Poor**	**Non Use**	**Total***
Net Grazing Potential (ha)	1 171	4 828	10 909	30 541	16 908
Excluded Net Grazing Due to Timber Harvest (ha)	-	1 310	2 720	2 992	4 030
Available Net Grazing (ha)	**1 171**	**3 518**	**8 189**	**27 549**	**12 878**
Available Grazing (AUM)	**1 171**	**1 407**	**2 340**		**4 918**
6th 10-yr Sequence	**Good**	**Fair**	**Poor**	**Non Use**	**Total***
Net Grazing Potential (ha)	1 171	4 828	10 909	30 541	16 908
Excluded Net Grazing Due to Timber Harvest (ha)	46	695	2 258	2 032	2 999
Available Net Grazing (ha)	**1 125**	**4 133**	**8 651**	**28 509**	**13 909**
Available Grazing (AUM)	**1 125**	**1 653**	**2 472**		**5 250**

*Total = (good + fair + poor); non use is not included
*Available Net Grazing (ha) = net grazing potential - excluded net grazing due to timber harvest.
*Available Net Grazing (AUM) was determined by dividing good, fair, poor by 1, 2.5 and 3.5 respectively.

Table 3.8f. Timber Harvest Impact on Net Grazing Potential (ha) and Available Net Grazing (ha and AUM) for FMU W13 through all six 10-yr sequences

1st 10-yr Sequence	Good	Fair	Poor	Non Use	Total*
Net Grazing Potential (ha)	959	22 115	3 695	27 940	26 769
Excluded Net Grazing Due to Timber Harvest (ha)	1	5 561	1 058	4 089	6 620
Available Net Grazing (ha)	**958**	**16 554**	**2 637**	**23 851**	**20 149**
Available Grazing (AUM)	**958**	**6 622**	**753**		**8 333**
2nd 10-yr Sequence	**Good**	**Fair**	**Poor**	**Non Use**	**Total***
Net Grazing Potential (ha)	959	22 115	3 695	27 940	26 769
Excluded Net Grazing Due to Timber Harvest (ha)	-	8 696	1 861	9 794	10 557
Available Net Grazing (ha)	**959**	**13 419**	**1 834**	**18 146**	**16 212**
Available Grazing (AUM)	**959**	**5 368**	**524**		**6 851**
3rd 10-yr Sequence	**Good**	**Fair**	**Poor**	**Non Use**	**Total***
Net Grazing Potential (ha)	959	22 115	3 695	27 940	26 769
Excluded Net Grazing Due to Timber Harvest (ha)	-	7 672	1 410	10 149	9 082
Available Net Grazing (ha)	**959**	**14 443**	**2 285**	**17 791**	**17 687**
Available Grazing (AUM)	**959**	**5 777**	**653**		**7 389**
4th 10-yr Sequence	**Good**	**Fair**	**Poor**	**Non Use**	**Total***
Net Grazing Potential (ha)	959	22 115	3 695	27 940	26 769
Excluded Net Grazing Due to Timber Harvest (ha)	-	7 301	1 088	5 767	8 389
Available Net Grazing (ha)	**959**	**14 814**	**2 607**	**22 173**	**18 380**
Available Grazing (AUM)	**959**	**5 926**	**745**		**7 629**
5th 10-yr Sequence	**Good**	**Fair**	**Poor**	**Non Use**	**Total***
Net Grazing Potential (ha)	959	22 115	3 695	27 940	26 769
Excluded Net Grazing Due to Timber Harvest (ha)	63	7 098	1 002	3 952	8 163
Available Net Grazing (ha)	**896**	**15 017**	**2 693**	**23 988**	**18 606**
Available Grazing (AUM)	**896**	**6 007**	**769**		**7 672**
6th 10-yr Sequence	**Good**	**Fair**	**Poor**	**Non Use**	**Total***
Net Grazing Potential (ha)	959	22 115	3 695	27 940	26 769
Excluded Net Grazing Due to Timber Harvest (ha)	89	4 751	658	2 370	5 498
Available Net Grazing (ha)	**870**	**17 364**	**3 037**	**25 570**	**21 271**
Available Grazing (AUM)	**870**	**6 946**	**868**		**8 683**

*Total = (good + fair + poor); non use is not included
*Available Net Grazing (ha) = net grazing potential - excluded net grazing due to timber harvest.
*Available Net Grazing (AUM) was determined by dividing good, fair, poor by 1, 2.5 and 3.5 respectively.

Table 3.8g. Timber Harvest Impact on Net Grazing Potential (ha) and Available Net Grazing (ha and AUM) for FMU W14 through all six 10-yr sequences

1st 10-yr Sequence	Good	Fair	Poor	Non Use	Total*
Net Grazing Potential (ha)	1 460	10 011	7 398	30 857	18 869
Excluded Net Grazing Due to Timber Harvest (ha)	63	136	94	151	293
Available Net Grazing (ha)	**1 397**	**9 875**	**7 304**	**30 706**	**18 576**
Available Grazing (AUM)	**1 397**	**3 950**	**2 087**		**7 434**
2nd 10-yr Sequence	**Good**	**Fair**	**Poor**	**Non Use**	**Total***
Net Grazing Potential (ha)	1 460	10 011	7 398	30 857	18 869
Excluded Net Grazing Due to Timber Harvest (ha)	-	-	-	-	-
Available Net Grazing (ha)	**1 460**	**10 011**	**7 398**	**30 857**	**18 869**
Available Grazing (AUM)	**1 460**	**4 004**	**2 114**		**7 578**
3rd 10-yr Sequence	**Good**	**Fair**	**Poor**	**Non Use**	**Total***
Net Grazing Potential (ha)	1 460	10 011	7 398	30 857	18 869
Excluded Net Grazing Due to Timber Harvest (ha)	-	-	-	-	-
Available Net Grazing (ha)	**1 460**	**10 011**	**7 398**	**30 857**	**18 869**
Available Grazing (AUM)	**1 460**	**4 004**	**2 114**		**7 578**
4th 10-yr Sequence	**Good**	**Fair**	**Poor**	**Non Use**	**Total***
Net Grazing Potential (ha)	1 460	10 011	7 398	30 857	18 869
Excluded Net Grazing Due to Timber Harvest (ha)	-	-	-	-	-
Available Net Grazing (ha)	**1 460**	**10 011**	**7 398**	**30 857**	**18 869**
Available Grazing (AUM)	**1 460**	**4 004**	**2 114**		**7 578**
5th 10-yr Sequence	**Good**	**Fair**	**Poor**	**Non Use**	**Total***
Net Grazing Potential (ha)	1 460	10 011	7 398	30 857	18 869
Excluded Net Grazing Due to Timber Harvest (ha)	-	-	-	-	-
Available Net Grazing (ha)	**1 460**	**10 011**	**7 398**	**30 857**	**18 869**
Available Grazing (AUM)	**1 460**	**4 004**	**2 114**		**7 578**
6th 10-yr Sequence	**Good**	**Fair**	**Poor**	**Non Use**	**Total***
Net Grazing Potential (ha)	1 460	10 011	7 398	30 857	18 869
Excluded Net Grazing Due to Timber Harvest (ha)	-	-	-	-	-
Available Net Grazing (ha)	**1 460**	**10 011**	**7 398**	**30 857**	**18 869**
Available Grazing (AUM)	**1 460**	**4 004**	**2 114**		**7 578**

*Total = (good + fair + poor); non use is not included
*Available Net Grazing (ha) = net grazing potential - excluded net grazing due to timber harvest.
*Available Net Grazing (AUM) was determined by dividing good, fair, poor by 1, 2.5 and 3.5 respectively.

Table 3.8h. Timber Harvest Impact on Net Grazing Potential (ha) and Available Net Grazing (ha and AUM) for FMU E3 through all six 10-yr sequences

1st 10-yr Sequence	Good	Fair	Poor	Non Use	Total*
Net Grazing Potential (ha)	1 834	9 451	187	31 642	11 472
Excluded Net Grazing Due to Timber Harvest (ha)	166	626	21	3 366	813
Available Net Grazing (ha)	**1 668**	**8 825**	**166**	**28 276**	**10 659**
Available Grazing (AUM)	**1 668**	**3 530**	**47**		**5 245**
2nd 10-yr Sequence	**Good**	**Fair**	**Poor**	**Non Use**	**Total***
Net Grazing Potential (ha)	1 834	9 451	187	31 642	11 472
Excluded Net Grazing Due to Timber Harvest (ha)	-	-	-	-	-
Available Net Grazing (ha)	**1 834**	**9 451**	**187**	**31 642**	**11 472**
Available Grazing (AUM)	**1 834**	**3 780**	**53**		**5 668**
3rd 10-yr Sequence	**Good**	**Fair**	**Poor**	**Non Use**	**Total***
Net Grazing Potential (ha)	1 834	9 451	187	31 642	11 472
Excluded Net Grazing Due to Timber Harvest (ha)	-	-	-	-	-
Available Net Grazing (ha)	**1 834**	**9 451**	**187**	**31 642**	**11 472**
Available Grazing (AUM)	**1 834**	**3 780**	**53**		**5 668**
4th 10-yr Sequence	**Good**	**Fair**	**Poor**	**Non Use**	**Total***
Net Grazing Potential (ha)	1 834	9 451	187	31 642	11 472
Excluded Net Grazing Due to Timber Harvest (ha)	-	-	-	-	-
Available Net Grazing (ha)	**1 834**	**9 451**	**187**	**31 642**	**11 472**
Available Grazing (AUM)	**1 834**	**3 780**	**53**		**5 668**
5th 10-yr Sequence	**Good**	**Fair**	**Poor**	**Non Use**	**Total***
Net Grazing Potential (ha)	1 834	9 451	187	31 642	11 472
Excluded Net Grazing Due to Timber Harvest (ha)	-	-	-	-	-
Available Net Grazing (ha)	**1 834**	**9 451**	**187**	**31 642**	**11 472**
Available Grazing (AUM)	**1 834**	**3 780**	**53**		**5 668**
6th 10-yr Sequence	**Good**	**Fair**	**Poor**	**Non Use**	**Total***
Net Grazing Potential (ha)	1 834	9 451	187	31 642	11 472
Excluded Net Grazing Due to Timber Harvest (ha)	-	-	-	-	-
Available Net Grazing (ha)	**1 834**	**9 451**	**187**	**31 642**	**11 472**
Available Grazing (AUM)	**1 834**	**3 780**	**53**		**5 668**

*Total = (good + fair + poor); non use is not included
*Available Net Grazing (ha) = net grazing potential - excluded net grazing due to timber harvest.
*Available Net Grazing (AUM) was determined by dividing good, fair, poor by 1, 2.5 and 3.5 respectively.

Table 3.8i. Timber Harvest Impact on Net Grazing Potential (ha) and Available Net Grazing (ha and AUM) for FMU R13 through all six 10-yr sequences

1st 10-yr Sequence	Good	Fair	Poor	Non Use	Total*
Net Grazing Potential (ha)	535	3 575	289	18 143	4 399
Excluded Net Grazing Due to Timber Harvest (ha)	90	909	58	2740	1 057
Available Net Grazing (ha)	**445**	**2 666**	**231**	**15 403**	**3 342**
Available Grazing (AUM)	**445**	**1 066**	**66**		**1 577**
2nd 10-yr Sequence	**Good**	**Fair**	**Poor**	**Non Use**	**Total***
Net Grazing Potential (ha)	535	3 575	289	18 143	4 399
Excluded Net Grazing Due to Timber Harvest (ha)	-	1 361	59	3 222	1 420
Available Net Grazing (ha)	**535**	**2 214**	**230**	**14 921**	**2 979**
Available Grazing (AUM)	**535**	**886**	**66**		**1 486**
3rd 10-yr Sequence	**Good**	**Fair**	**Poor**	**Non Use**	**Total***
Net Grazing Potential (ha)	535	3 575	289	18 143	4 399
Excluded Net Grazing Due to Timber Harvest (ha)	-	-	-	-	-
Available Net Grazing (ha)	**535**	**3 575**	**289**	**18 143**	**4 399**
Available Grazing (AUM)	**535**	**1 430**	**83**		**2 048**
4th 10-yr Sequence	**Good**	**Fair**	**Poor**	**Non Use**	**Total***
Net Grazing Potential (ha)	535	3 575	289	18 143	4 399
Excluded Net Grazing Due to Timber Harvest (ha)	-	-	-	-	-
Available Net Grazing (ha)	**535**	**3 575**	**289**	**18 143**	**4 399**
Available Grazing (AUM)	**535**	**1 430**	**83**		**2 048**
5th 10-yr Sequence	**Good**	**Fair**	**Poor**	**Non Use**	**Total***
Net Grazing Potential (ha)	535	3 575	289	18 143	4 399
Excluded Net Grazing Due to Timber Harvest (ha)	-	-	-	-	-
Available Net Grazing (ha)	**535**	**3 575**	**289**	**18 143**	**4 399**
Available Grazing (AUM)	**535**	**1 430**	**83**		**2 048**
6th 10-yr Sequence	**Good**	**Fair**	**Poor**	**Non Use**	**Total***
Net Grazing Potential (ha)	535	3 575	289	18 143	4 399
Excluded Net Grazing Due to Timber Harvest (ha)	-	-	-	-	-
Available Net Grazing (ha)	**535**	**3 575**	**289**	**18 143**	**4 399**
Available Grazing (AUM)	**535**	**1 430**	**83**		**2 048**

*Total = (good + fair + poor); non use is not included
*Available Net Grazing (ha) = net grazing potential - excluded net grazing due to timber harvest.
*Available Net Grazing (AUM) was determined by dividing good, fair, poor by 1, 2.5 and 3.5 respectively.

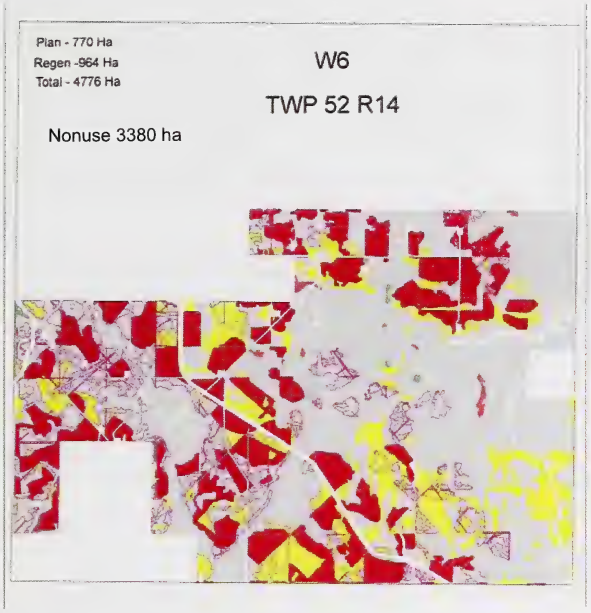
Description of Subjective Fragmentation Methodology

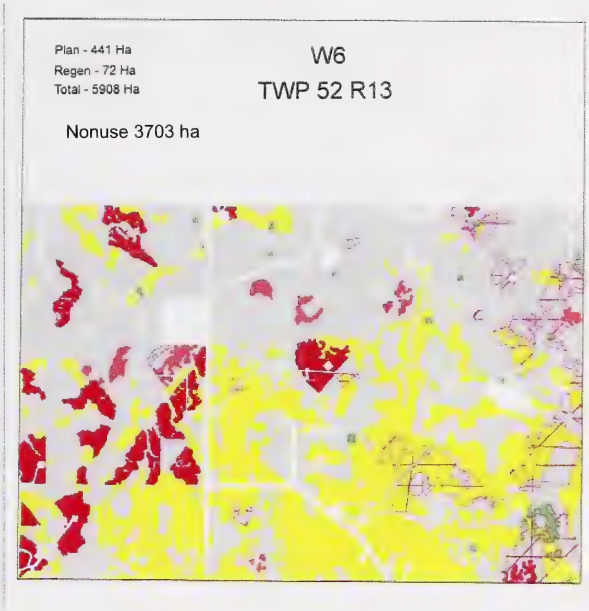
The grazing potential within each FMU is naturally fragmented, and when combined with the fragmentation created by timber harvesting activities (regenerating and planned cutblocks within a 10-yr sequence) the fragmentation of the grazing potential increases.

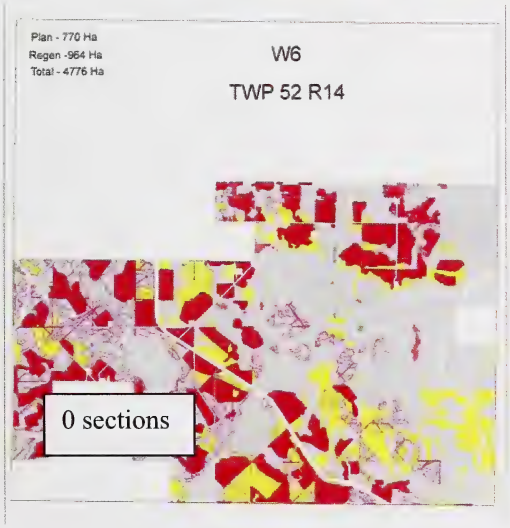
The following subjective net down was developed to further describe the SRCC for each FMU. The net down was used as an estimate of how much of the SRCC was suited to allocations using current operating standards (relatively contiguous grazing with little fragmentation) or intensive operating standards (fragmented grazing).

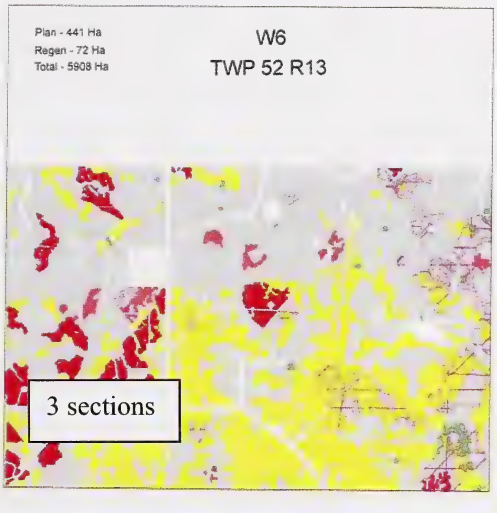
Steps to determining the fragmentation net down:

- A township representing "heavy" and "light" timber harvesting activity was randomly selected from each FMU.
- Within each township the hectares of planned and regenerating cutblocks, hectares of total area and non-use grazing potential were determined.
- Non-use grazing was subtracted from total areas to determine hectares of suitable grazing (good, fair, poor grazing potentials).
    - 4776 – 3380 = 1396 ha in "heavy" township
    - 5908 – 3703 = 2205 ha in "light" township









- An ocular estimate of how many sections of relatively contiguous grazing was made in each township. A section of grazing potential was considered the minimum area sufficient to support a forested grazing disposition. 1 section = 640 acres or 259 ha.

- The percentage of contiguous grazing at least one section in size was determined by dividing the number of sections by hectares of grazing and multiplying by one-hundred.
  - 0/1396 x 100% = 0% of this township is suitable to allocate for grazing.
  - (3 x 259 ha)/2205 x 100% = 35% of this township is suitable to allocate for grazing.

- The average of the 2 townships was used to estimate the amount of area within the FMU that would suitable to allocate for grazing.
  - (0% + 35%)/ 2 = 18%.

Therefore, given the natural fragmentation of the grazing potential and the fragmentation created by timber harvesting within FMU W6, approximately 18% of the area is suitable for grazing allocation with current operating standards (contiguous grazing with little fragmentation), while 82% is suitable for grazing allocation with intensive operating standards (grazing is fragmented).

Table 3.9 Subjective Net Down (%) Used to Account for Fragmentation of the Grazing Potential Due to Natural Landscape Variations and Timber Harvesting

FMU	Current Operating Standards	Intensive Operating Standards
W6	18	82
W5	20	80
E1	0	0
E2	11	89
W11	20	80
W13	23	77
W14	43	57
E3	37	63
R13	0	0

Table 3.10a. Impact of timber harvesting (AUM and %) by grazing disposition number in each FMU for each 10-yr sequence

*Note: Present day AUM and Impact (AUM and %) estimated from maps and SRCC analysis; consult grazing disposition agreements for detailed AUM information.

			Timber Harvest Impact											
			10 Year		20 Year		30 Year		40 Year		50 Year		60 Year	
Dispositions	FMU	Present Day AUM*	AUM	%	AUM	%	AUM	%	AUM	%	AUM	%	AUM	%
FGL000003	E2	93	39	42	23	25	23	24	25	27	11	12	18	20
FGL000007	W5	36	7	20	17	46	23	63	22	62	12	35	3	8
FGL010001	W5,W6	0	0	0	0	0	0	0	0	0	0	0	0	0
FGL010003	W5	71	22	30	16	22	8	11	18	26	41	57	29	40
FGL010008	E2	18	23	47	27	56	4	9	19	39	16	34	19	41
FGL010009	W6	271	155	57	168	62	139	51	90	33	2	1	0	0
FGL020001	W13	5	0	0	0	0	0	0	0	0	1	24	1	24
FGL020003	E2	22	8	38	3	15	5	24	2	10	6	30	5	21
FGL790012	W13	35	14	40	20	57	6	16	0	0	0	0	0	0
FGL800017	W5	70	9	13	18	26	18	26	21	30	6	9	16	23
FGL800019	W5	34	3	10	7	21	4	11	8	23	6	17	15	44
FGL820003	W13	259	40	16	75	29	47	18	50	19	68	26	50	19
FGL820022	E2	110	13	12	3	3	5	5	21	19	30	28	31	29
FGL830005	W13	82	5	7	19	23	30	36	19	24	28	33	12	15
FGL840001	W13	24	5	22	6	25	4	18	4	18	18	77	0	0
FGL840023	W13	144	33	23	75	52	79	55	24	17	0	0	0	0
FGL850004	R13	2	0	0	0	0	0	0	0	0	0	0	0	0
FGL850512	R13	6	0	0	0	0	0	0	0	0	0	0	0	0
FGL870014	W13	92	12	13	23	25	21	23	11	12	4	4	21	23
FGL880012	E2	79	1	2	1	2	9	11	8	10	36	46	49	61
FGL880015	W13	309	43	14	73	23	55	18	33	11	110	36	141	46
FGL880018	W11	82	35	42	49	60	3	4	9	11	4	5	4	5
FGL880024	E2	25	5	21	5	21	0	0	18	71	18	71	19	77
FGL890003	W5	73	20	27	32	43	29	40	19	26	16	22	14	19
FGL890012	E2	17	2	9	2	9	2	9	9	50	9	50	9	50
FGL890020	W6	17	2	12	5	29	3	17	3	17	0	0	12	69
FGL890025	E2	25	0	0	0	0	4	15	5	19	17	69	18	71
FGL890027	W5	402	204	51	132	33	181	45	128	32	59	15	28	7
FGL890030	E2	84	18	21	19	23	28	33	38	46	37	44	23	27
FGL900001	E2	5	0	0	0	0	0	0	0	0	0	0	0	0
FGL900007	E2	81	27	33	21	26	26	32	25	31	22	27	23	28

			Timber Harvest Impact											
			10 Year		20 Year		30 Year		40 Year		50 Year		60 Year	
Dispositions	FMU	Present Day AUM*	AUM	%	AUM	%	AUM	%	AUM	%	AUM	%	AUM	%
FGL900025	W13	44	22	50	31	69	9	21	0	1	0	0	0	0
FGL910013	E2	3	0	0	0	0	0	0	0	0	3	100	3	100
FGL910015	W13	47	11	23	29	62	23	49	5	10	13	28	11	23
FGL910016	W5	71	15	22	15	22	0	0	28	39	51	71	51	71
FGL920005	W11	10	0	0	0	3	0	0	0	0	0	0	0	0
FGL920014	E2	24	7	31	8	35	7	30	7	31	11	47	8	32
FGL930010	R13	79	17	22	33	42	0	0	0	0	0	0	0	0
FGL940004	E2	75	6	8	28	37	50	67	52	70	27	37	5	6
FGL940013	W13	50	12	24	16	33	23	46	20	41	24	49	29	23
FGL940021	W5	27	2	8	1	5	2	8	1	3	1	4	9	34
FGL950006	E2	26	0	0	0	0	0	2	17	66	21	82	22	83
FGL950008	E2	29	11	38	2	5	1	3	4	15	5	17	5	17
FGL950010	E2	24	12	49	12	49	12	49	0	0	11	46	11	46
FGL950016	W5	43	16	38	30	69	20	47	22	51	5	11	8	18
FGL960007	W13	81	31	39	47	58	23	29	9	11	2	2	5	6
FGL960019	E2	35	6	18	4	13	4	11	3	10	7	20	12	35
FGL960021	W13	23	1	5	9	38	8	36	8	33	8	33	0	0
FGL960023	W5	23	0	0	0	1	0	1	0	1	7	30	13	56
FGL960024	W6	18	5	30	6	36	1	6	1	8	1	6	6	35
FGL970016	R13	68	21	31	25	37	0	0	0	0	0	0	0	0
FGL980010	W5	0	0	0	0	0	0	0	0	0	0	0	0	0
GRL030060	W11	33	0	0	0	0	0	0	0	0	0	0	0	0
GRL038852	W13	0	0	0	0	0	0	0	0	0	0	0	0	0
GRL039756	E2	49	0	1	0	1	0	0	0	1	28	57	48	97
GRL040054	W13	0	0	0	0	0	0	0	0	0	0	0	0	0
GRL16097	W5	70	9	13	18	25	23	33	21	30	9	13	12	17
GRL16249	W11	28	0	0	14	50	0	0	0	0	2	7	2	7
GRL16454	W5	58	6	10	0	0	9	15	19	32	20	35	12	20
GRL16540	W13	102	0	0	36	35	44	43	41	40	30	29	20	20
GRL16585	E2	21	0	0	7	33	7	33	7	33	0	0	0	0
GRL16769	W13	40	0	0	31	79	30	76	14	35	2	4	1	1
GRL16827	E2	24	14	58	0	0	6	24	6	24	6	24	2	7
GRL16972	W5,W6, W13	795	400	50	254	32	251	32	104	13	78	10	88	11
GRL17013	E2	80	37	46	41	52	49	61	24	30	22	27	13	16
GRL34501	W5	76	32	42	31	40	22	28	19	25	14	19	8	10

			Timber Harvest Impact											
			10 Year		20 Year		30 Year		40 Year		50 Year		60 Year	
Dispositions	FMU	Present Day AUM*	AUM	%	AUM	%	AUM	%	AUM	%	AUM	%	AUM	%
GRL36280	E2	139	38	27	46	33	19	14	61	44	63	46	61	44
GRL36682	W11	84	0	0	0	0	0	0	0	0	0	0	0	0
GRL37186	W13	50	5	10	5	10	39	78	41	81	22	45	9	18
GRL37225	W13	155	0	0	19	12	22	14	14	9	16	10	8	5
GRL37423	E2	0	0	0	0	0	0	0	0	0	0	0	0	0
GRL37469	E2	150	37	25	26	17	49	33	70	46	45	30	28	18
GRL37478	E2	2	0	0	0	0	0	0	2	100	2	100	2	100
GRL37546	W5	0	0	0	0	0	0	0	0	0	0	0	0	0
GRL37678	E2	139	49	35	62	44	72	51	39	28	26	19	15	11
GRL37990	W13	23	0	0	0	0	0	0	1	2	1	2	0	0
GRL38132	W5	139	12	9	46	33	45	32	59	42	71	51	67	48
GRL38204	W5	18	9	49	6	35	4	22	0	0	0	0	5	29
GRL38299	E2	60	0	0	1	2	2	3	2	3	7	12	7	12
GRL38504	E2	90	41	45	51	57	53	59	15	17	18	20	17	19
GRL38603	E2	196	7	4	16	8	27	14	55	28	65	33	63	32
GRL38718	W13	35	5	15	14	40	17	48	9	26	2	7	1	3
GRL38748	W13	44	23	51	26	58	1	33	7	17	0	0	0	0
GRL38777	E2	74	12	16	17	22	31	42	25	33	20	26	5	7
GRL38813	W11	71	0	0	0	0	0	0	0	0	0	0	0	0
GRL38819	W5	23	16	66	10	44	11	48	6	24	2	7	1	3
GRL38838	W13	86	21	25	21	25	14	16	12	14	18	21	12	14
GRL38955	E2	78	16	20	28	36	32	41	37	47	26	33	24	31
GRL38967	W13	59	5	8	37	63	33	56	13	22	0	0	0	0
GRL39265	E2	288	77	27	96	33	124	43	88	31	72	25	40	14
GRL39275	W5,W6	51	12	24	35	69	23	45	24	47	1	4	0	0
GRL39279	W5	18	6	35	0	0	8	41	8	41	9	48	3	14
GRL39359	W5	125	18	14	23	18	17	14	18	14	18	15	33	26
GRL39414	W13	96	29	30	30	31	24	25	28	29	31	32	12	12
GRL39454	W5	0	0	0	0	0	0	0	0	0	0	0	0	0
GRL39567	W13	102	18	18	35	34	66	64	53	52	27	27	10	10
GRL39579	W13	230	42	18	70	31	41	18	30	13	20	8	18	8
GRL39716	W13	0	0	0	0	0	0	0	0	0	0	0	0	0
GRL39734	W11	13	0	0	1	9	0	0	0	0	0	0	0	0
GRL39799	W13	29	0	0	5	18	27	71	15	53	0	0	0	0
GRL39884	W13	39	0	0	15	40	16	41	2	4	1	3	0	0
GRL39887	W13	273	8	3	68	25	60	2	45	17	25	9	3	1

			Timber Harvest Impact											
			10 Year		20 Year		30 Year		40 Year		50 Year		60 Year	
Dispositions	FMU	Present Day AUM*	AUM	%	AUM	%	AUM	%	AUM	%	AUM	%	AUM	%
GRL39901	W13	26	0	0	0	0	0	0	26	100	26	100	0	0
GRL39951	E2	1 022	72	7	130	13	194	19	162	16	126	12	65	6
GRL40008	E2	210	47	22	64	31	108	52	89	43	86	41	45	21
GRL40030	E2	131	36	28	39	30	36	28	35	27	36	27	16	12
GRL40034	W13	253	4	2	56	22	36	14	35	14	60	24	51	20
GRL40135	E2	45	0	0	0	0	0	0	4	9	6	12	11	24
GRL40248	W5	47	2	4	2	4	2	4	2	3	2	3	4	9
GRL40252	E2	177	133	75	107	61	108	61	18	10	17	9	1	0
GRL40372	W5	18	8	46	0	0	8	46	4	46	8	46	0	0
GRL40396	E2	120	67	56	8	7	15	12	22	18	25	21	24	20
GRL40501	W11	23	0	0	18	75	0	0	0	0	0	0	0	0
GRL40520	W11	40	1	3	5	13	12	30	12	30	0	0	0	0
GRL40534	W5	154	26	17	33	21	56	36	31	20	40	26	17	11
GRL40535	W11	101	4	4	8	8	1	1	2	2	5	5	6	5
GRL40556	E2	96	11	11	13	14	7	7	25	26	23	24	24	24
GRL40586	W13	28	1	3	12	44	19	69	8	29	1		1	2
GRL40602	W13	96	10	11	21	22	17	18	9	10	19	19	12	12
GRL40640	E2	92	6	6	9	9	31	34	41	45	39	43	22	24
GRL40672	W11	37	0	0	0	0	0	0	0	0	0	0	0	0
GRL40673	W11	129	0	0	60	47	2	2	11	9	11	8	23	18
GRL40674	W11	163	2	1	70	43	6	4	38	23	39	24	32	20
GRL40779	W6	12	5	43	2	14	2	14	5	43	6	55	6	55
GRL40829	E2	138	31	23	11	8	24	17	45	33	54	39	41	30
GRL40835	W5	0	0	0	0	0	0	0	0	0	0	0	0	0
GRL40852	W5	108	5	5	13	12	32	30	31	29	34	31	12	11
GRL40926	W5	36	18	50	1	1	1	1	13	37	13	36	13	37
GRL780008	W11	22	0	0	0	0	0	0	0	0	0	0	0	0
GRL780188	W5	58	2	3	13	23	18	31	17	30	20	35	29	50
GRL780253	W13	0	0	0	0	0	0	0	0	0	0	0	0	0
GRL780575	W11	5	0	0	0	0	0	0	0	0	2	46	2	46
GRL790524	W5	92	17	19	28	30	37	40	29	31	18	20	26	29
GRL800169	W11	19	7	38	7	38	0	0	11	57	11	57	11	57
GRL810453	W13	309	28	9	53	17	99	32	89	29	165	53	127	41
GRL810494	W11	23	0	0	0	0	0	0	0	0	0	0	0	0
GRL820372	W13	25	0	0	0	0	7	29	11	45	16	63	4	18
GRL820434	W5	75	8	11	8	11	10	13	6	8	2	3	3	3

			Timber Harvest Impact											
			10 Year		20 Year		30 Year		40 Year		50 Year		60 Year	
Dispositions	FMU	Present Day AUM*	AUM	%	AUM	%	AUM	%	AUM	%	AUM	%	AUM	%
GRL820512	E2	145	38	26	63	44	60	41	39	27	13	9	4	3
GRL830091	W5	18	3	18	10	58	13	72	12	65	4	20	1	6
GRL830277	W5	5	0	0	0	0	3	56	3	56	3	56	0	0
GRL830324	W5	21	0	0	0	0	7	33	7	33	17	79	10	46
GRL830436	W5	143	50	35	27	19	28	20	43	30	40	28	35	24
GRL830508	W11	88	54	62	73	83	6	7	9	10	5	5	2	3
GRL840026	W5	86	24	27	43	51	60	70	52	61	25	29	8	10
GRL840528	W6	16	0	0	12	78	12	78	13	82	1	9	1	9
GRL850351	W5	315	94	30	122	39	116	37	72	23	25	8	75	24
GRL850430	W5	33	2	6	2	6	2	6	1	4	28	85	29	86
GRL850439	W11	227	60	26	170	75	3	1	21	9	12	5	8	3
GRL850440	W13	51	0	0	0	0	15	29	47	92	32	63	32	63
GRL860021	W6	193	80	42	73	38	39	20	52	27	40	21	40	21
GRL860328	W13	33	0	0	0	0	5	15	5	15	0	0	0	0
GRL860481	W5	30	3	10	7	24	5	15	9	30	6	19	10	35
GRL870022	W5	0	0	0	0	0	0	0	0	0	0	0	0	0
GRL890012	E1	13	0	0	0	0	0	0	0	0	0	0	0	0
GRL890044	W5	54	28	52	15	28	29	55	24	45	24	45	0	1
GRL920022	W5,W6	199	50	25	122	60	95	48	93	47	4	2	3	2
GRL960009	W13	0	0	0	0	0	0	0	0	0	0	0	0	0
GRL960073	W13	47	10	20	17	37	29	61	20	43	7	14	6	14
GRL960077	W13	17	3	15	7	42	10	57	5	31	0	0	0	0
GRL970035	W13	49	8	16	22	46	25	52	24	49	12	24	1	2
GRL970062	W13	20	5	29	13	68	8	39	3	16	0	2	0	0
GRP787879	W13	27	0	0	0	0	13	48	16	60	3	12	0	0
GRP787925	R13	20	2	10	0	0	0	0	0	0	0	0	0	0
GRP790046	W13	0	0	0	0	0	0	0	0	0	0	0	0	0
GRP840064	E2	21	0	0	2	7	2	7	8	38	6	31	6	31
GRP840066	E2	17	0	0	4	21	7	43	8	47	7	39	4	24
GRP950003	W5	115	8	7	11	9	7	6	53	46	77	67	74	64

Table 3.10b. Impact of timber harvesting (AUM and %) by FMU for each 10-yr sequence

*Note: Present day AUM and Impact (AUM and %) estimated from maps and SRCC analysis; consult grazing disposition agreements for detailed AUM information.

			Timber Harvest Impact											
			10 Year		20 Year		30 Year		40 Year		50 Year		60 Year	
FMU	Dispositions	Present Day AUM*	AUM	%	AUM	%	AUM	%	AUM	%	AUM	%	AUM	%
E1	GRL890012	13	0	0	0	0	0	0	0	0	0	0	0	0
E2	FGL000003	93	39	42	23	25	23	24	25	27	11	12	18	20
E2	FGL010008	18	23	47	27	56	4	9	19	39	16	34	19	41
E2	FGL020003	22	8	38	3	15	5	24	2	10	6	30	5	21
E2	FGL820022	110	13	12	3	3	5	5	21	19	30	28	31	29
E2	FGL880012	79	1	2	1	2	9	11	8	10	36	46	49	61
E2	FGL880024	25	5	21	5	21	0	0	18	71	18	71	19	77
E2	FGL890012	17	2	9	2	9	2	9	9	50	9	50	9	50
E2	FGL890025	25	0	0	0	0	4	15	5	19	17	69	18	71
E2	FGL890030	84	18	21	19	23	28	33	38	46	37	44	23	27
E2	FGL900001	5	0	0	0	0	0	0	0	0	0	0	0	0
E2	FGL900007	81	27	33	21	26	26	32	25	31	22	27	23	28
E2	FGL910013	3	0	0	0	0	0	0	0	0	3	100	3	100
E2	FGL920014	24	7	31	8	35	7	30	7	31	11	47	8	32
E2	FGL940004	75	6	8	28	37	50	67	52	70	27	37	5	6
E2	FGL950006	26	0	0	0	0	0	2	17	66	21	82	22	83
E2	FGL950008	29	11	38	2	5	1	3	4	15	5	17	5	17
E2	FGL950010	24	12	49	12	49	12	49	0	0	11	46	11	46
E2	FGL960019	35	6	18	4	13	4	11	3	10	7	20	12	35
E2	GRL039756	49	0	1	0	1	0	0	0	1	28	57	48	97
E2	GRL16585	21	0	0	7	33	7	33	7	33	0	0	0	0
E2	GRL16827	24	14	58	0	0	6	24	6	24	6	24	2	7
E2	GRL17013	80	37	46	41	52	49	61	24	30	22	27	13	16
E2	GRL36280	139	38	27	46	33	19	14	61	44	63	46	61	44
E2	GRL37423	0	0	0	0	0	0	0	0	0	0	0	0	0
E2	GRL37469	150	37	25	26	17	49	33	70	46	45	30	28	18
E2	GRL37478	2	0	0	0	0	0	0	2	100	2	100	2	100
E2	GRL37678	139	49	35	62	44	72	51	39	28	26	19	15	11
E2	GRL38299	60	0	0	1	2	2	3	2	3	7	12	7	12
E2	GRL38504	90	41	45	51	57	53	59	15	17	18	20	17	19
E2	GRL38603	196	7	4	16	8	27	14	55	28	65	33	63	32

			Timber Harvest Impact											
			10 Year		20 Year		30 Year		40 Year		50 Year		60 Year	
FMU	Dispositions	Present Day AUM*	AUM	%	AUM	%	AUM	%	AUM	%	AUM	%	AUM	%
E2	GRL38777	74	12	16	17	22	31	42	25	33	20	26	5	7
E2	GRL38955	78	16	20	28	36	32	41	37	47	26	33	24	31
E2	GRL39265	288	77	27	96	33	124	43	88	31	72	25	40	14
E2	GRL39951	1 022	72	7	130	13	194	19	162	16	126	12	65	6
E2	GRL40008	210	47	22	64	31	108	52	89	43	86	41	45	21
E2	GRL40030	131	36	28	39	30	36	28	35	27	36	27	16	12
E2	GRL40135	45	0	0	0	0	0	0	4	9	6	12	11	24
E2	GRL40252	177	133	75	107	61	108	61	18	10	17	9	1	0
E2	GRL40396	120	67	56	8	7	15	12	22	18	25	21	24	20
E2	GRL40556	96	11	11	13	14	7	7	25	26	23	24	24	24
E2	GRL40640	92	6	6	9	9	31	34	41	45	39	43	22	24
E2	GRL40829	138	31	23	11	8	24	17	45	33	54	39	41	30
E2	GRL820512	145	38	26	63	44	60	41	39	27	13	9	4	3
E2	GRP840064	21	0	0	2	7	2	7	8	38	6	31	6	31
E2	GRP840066	17	0	0	4	21	7	43	8	47	7	39	4	24
R13	FGL850004	2	0	0	0	0	0	0	0	0	0	0	0	0
R13	FGL850512	6	0	0	0	0	0	0	0	0	0	0	0	0
R13	FGL930010	79	17	22	33	42	0	0	0	0	0	0	0	0
R13	FGL970016	68	21	31	25	37	0	0	0	0	0	0	0	0
R13	GRP787925	20	2	10	0	0	0	0	0	0	0	0	0	0
W11	FGL880018	82	35	42	49	60	3	4	9	11	4	5	4	5
W11	FGL920005	10	0	0	0	3	0	0	0	0	0	0	0	0
W11	GRL030060	33	0	0	0	0	0	0	0	0	0	0	0	0
W11	GRL16249	28	0	0	14	50	0	0	0	0	2	7	2	7
W11	GRL36682	84	0	0	0	0	0	0	0	0	0	0	0	0
W11	GRL38813	71	0	0	0	0	0	0	0	0	0	0	0	0
W11	GRL39734	13	0	0	1	9	0	0	0	0	0	0	0	0
W11	GRL40501	23	0	0	18	75	0	0	0	0	0	0	0	0
W11	GRL40520	40	1	3	5	13	12	30	12	30	0	0	0	0
W11	GRL40535	101	4	4	8	8	1	1	2	2	5	5	6	5
W11	GRL40672	37	0	0	0	0	0	0	0	0	0	0	0	0
W11	GRL40673	129	0	0	60	47	2	2	11	9	11	8	23	18
W11	GRL40674	163	2	1	70	43	6	4	38	23	39	24	32	20
W11	GRL780008	22	0	0	0	0	0	0	0	0	0	0	0	0
W11	GRL780575	5	0	0	0	0	0	0	0	0	2	46	2	46
W11	GRL800169	19	7	38	7	38	0	0	11	57	11	57	11	57
W11	GRL810494	23	0	0	0	0	0	0	0	0	0	0	0	0

			Timber Harvest Impact											
			10 Year		20 Year		30 Year		40 Year		50 Year		60 Year	
FMU	Dispositions	Present Day AUM*	AUM	%	AUM	%	AUM	%	AUM	%	AUM	%	AUM	%
W11	GRL830508	88	54	62	73	83	6	7	9	10	5	5	2	3
W11	GRL850439	227	60	26	170	75	3	1	21	9	12	5	8	3
W13	FGL020001	5	0	0	0	0	0	0	0	0	1	24	1	24
W13	FGL790012	35	14	40	20	57	6	16	0	0	0	0	0	0
W13	FGL820003	259	40	16	75	29	47	18	50	19	68	26	50	19
W13	FGL830005	82	5	7	19	23	30	36	19	24	28	33	12	15
W13	FGL840001	24	5	22	6	25	4	18	4	18	18	77	0	0
W13	FGL840023	144	33	23	75	52	79	55	24	17	0	0	0	0
W13	FGL870014	92	12	13	23	25	21	23	11	12	4	4	21	23
W13	FGL880015	309	43	14	73	23	55	18	33	11	110	36	141	46
W13	FGL900025	44	22	50	31	69	9	21	0	1	0	0	0	0
W13	FGL910015	47	11	23	29	62	23	49	5	10	13	28	11	23
W13	FGL940013	50	12	24	16	33	23	46	20	41	24	49	29	23
W13	FGL960007	81	31	39	47	58	23	29	9	11	2	2	5	6
W13	FGL960021	23	1	5	9	38	8	36	8	33	8	33	0	0
W13	GRL038852	0	0	0	0	0	0	0	0	0	0	0	0	0
W13	GRL040054	0	0	0	0	0	0	0	0	0	0	0	0	0
W13	GRL16540	102	0	0	36	35	44	43	41	40	30	29	20	20
W13	GRL16769	40	0	0	31	79	30	76	14	35	2	4	1	1
W13	GRL37186	50	5	10	5	10	39	78	41	81	22	45	9	18
W13	GRL37225	155	0	0	19	12	22	14	14	9	16	10	8	5
W13	GRL37990	23	0	0	0	0	0	0	1	2	1	2	0	0
W13	GRL38718	35	5	15	14	40	17	48	9	26	2	7	1	3
W13	GRL38748	44	23	51	26	58	1	33	7	17	0	0	0	0
W13	GRL38838	86	21	25	21	25	14	16	12	14	18	21	12	14
W13	GRL38967	59	5	8	37	63	33	56	13	22	0	0	0	0
W13	GRL39414	96	29	30	30	31	24	25	28	29	31	32	12	12
W13	GRL39567	102	18	18	35	34	66	64	53	52	27	27	10	10
W13	GRL39579	230	42	18	70	31	41	18	30	13	20	8	18	8
W13	GRL39716	0	0	0	0	0	0	0	0	0	0	0	0	0
W13	GRL39799	29	0	0	5	18	27	71	15	53	0	0	0	0
W13	GRL39884	39	0	0	15	40	16	41	2	4	1	3	0	0
W13	GRL39887	273	8	3	68	25	60	2	45	17	25	9	3	1
W13	GRL39901	26	0	0	0	0	0	0	26	100	26	100	0	0
W13	GRL40034	253	4	2	56	22	36	14	35	14	60	24	51	20
W13	GRL40586	28	1	3	12	44	19	69	8	29	1		1	2
W13	GRL40602	96	10	11	21	22	17	18	9	10	19	19	12	12

			Timber Harvest Impact											
			10 Year		20 Year		30 Year		40 Year		50 Year		60 Year	
FMU	Dispositions	Present Day AUM*	AUM	%	AUM	%	AUM	%	AUM	%	AUM	%	AUM	%
W13	GRL780253	0	0	0	0	0	0	0	0	0	0	0	0	0
W13	GRL810453	309	28	9	53	17	99	32	89	29	165	53	127	41
W13	GRL820372	25	0	0	0	0	7	29	11	45	16	63	4	18
W13	GRL850440	51	0	0	0	0	15	29	47	92	32	63	32	63
W13	GRL860328	33	0	0	0	0	5	15	5	15	0	0	0	0
W13	GRL960009	0	0	0	0	0	0	0	0	0	0	0	0	0
W13	GRL960073	47	10	20	17	37	29	61	20	43	7	14	6	14
W13	GRL960077	17	3	15	7	42	10	57	5	31	0	0	0	0
W13	GRL970035	49	8	16	22	46	25	52	24	49	12	24	1	2
W13	GRL970062	20	5	29	13	68	8	39	3	16	0	2	0	0
W13	GRP787879	27	0	0	0	0	13	48	16	60	3	12	0	0
W13	GRP790046	0	0	0	0	0	0	0	0	0	0	0	0	0
W5	FGL000007	36	7	20	17	46	23	63	22	62	12	35	3	8
W5	FGL010003	71	22	30	16	22	8	11	18	26	41	57	29	40
W5	FGL800017	70	9	13	18	26	18	26	21	30	6	9	16	23
W5	FGL800019	34	3	10	7	21	4	11	8	23	6	17	15	44
W5	FGL890003	73	20	27	32	43	29	40	19	26	16	22	14	19
W5	FGL890027	402	204	51	132	33	181	45	128	32	59	15	28	7
W5	FGL910016	71	15	22	15	22	0	0	28	39	51	71	51	71
W5	FGL940021	27	2	8	1	5	2	8	1	3	1	4	9	34
W5	FGL950016	43	16	38	30	69	20	47	22	51	5	11	8	18
W5	FGL960023	23	0	0	0	1	0	1	0	1	7	30	13	56
W5	FGL980010	0	0	0	0	0	0	0	0	0	0	0	0	0
W5	GRL16097	70	9	13	18	25	23	33	21	30	9	13	12	17
W5	GRL16454	58	6	10	0	0	9	15	19	32	20	35	12	20
W5	GRL34501	76	32	42	31	40	22	28	19	25	14	19	8	10
W5	GRL37546	0	0	0	0	0	0	0	0	0	0	0	0	0
W5	GRL38132	139	12	9	46	33	45	32	59	42	71	51	67	48
W5	GRL38204	18	9	49	6	35	4	22	0	0	0	0	5	29
W5	GRL38819	23	16	66	10	44	11	48	6	24	2	7	1	3
W5	GRL39279	18	6	35	0	0	8	41	8	41	9	48	3	14
W5	GRL39359	125	18	14	23	18	17	14	18	14	18	15	33	26
W5	GRL39454	0	0	0	0	0	0	0	0	0	0	0	0	0
W5	GRL40248	47	2	4	2	4	2	4	2	3	2	3	4	9
W5	GRL40372	18	8	46	0	0	8	46	4	46	8	46	0	0
W5	GRL40534	154	26	17	33	21	56	36	31	20	40	26	17	11
W5	GRL40835	0	0	0	0	0	0	0	0	0	0	0	0	0

			Timber Harvest Impact											
			10 Year		20 Year		30 Year		40 Year		50 Year		60 Year	
FMU	Dispositions	Present Day AUM*	AUM	%	AUM	%	AUM	%	AUM	%	AUM	%	AUM	%
W5	GRL40852	108	5	5	13	12	32	30	31	29	34	31	12	11
W5	GRL40926	36	18	50	1	1	1	1	13	37	13	36	13	37
W5	GRL780188	58	2	3	13	23	18	31	17	30	20	35	29	50
W5	GRL790524	92	17	19	28	30	37	40	29	31	18	20	26	29
W5	GRL820434	75	8	11	8	11	10	13	6	8	2	3	3	3
W5	GRL830091	18	3	18	10	58	13	72	12	65	4	20	1	6
W5	GRL830277	5	0	0	0	0	3	56	3	56	3	56	0	0
W5	GRL830324	21	0	0	0	0	7	33	7	33	17	79	10	46
W5	GRL830436	143	50	35	27	19	28	20	43	30	40	28	35	24
W5	GRL840026	86	24	27	43	51	60	70	52	61	25	29	8	10
W5	GRL850351	315	94	30	122	39	116	37	72	23	25	8	75	24
W5	GRL850430	33	2	6	2	6	2	6	1	4	28	85	29	86
W5	GRL860481	30	3	10	7	24	5	15	9	30	6	19	10	35
W5	GRL870022	0	0	0	0	0	0	0	0	0	0	0	0	0
W5	GRL890044	54	28	52	15	28	29	55	24	45	24	45	0	1
W5	GRP950003	115	8	7	11	9	7	6	53	46	77	67	74	64
W5,W6	FGL010001	0	0	0	0	0	0	0	0	0	0	0	0	0
W5,W6	GRL39275	51	12	24	35	69	23	45	24	47	1	4	0	0
W5,W6	GRL920022	199	50	25	122	68	95	48	93	47	4	2	3	2
W5,W13	GRL16972	795	400	50	254	32	251	32	104	13	70	10	88	11
W6	FGL010009	271	155	57	168	62	139	51	90	33	2	1	0	0
W6	FGL890020	17	2	12	5	29	3	17	3	17	0	0	12	69
W6	FGL960024	18	5	30	6	36	1	6	1	8	1	6	6	35
W6	GRL40779	12	5	43	2	14	2	14	5	43	6	55	6	55
W6	GRL840528	16	0	0	12	78	12	78	13	82	1	9	1	9
W6	GRL860021	193	80	42	73	38	39	20	52	27	40	21	40	21

APPENDIX 3:
Current Timber Allocations in the RGP

Table 4.1. Timber allocations in the Regional Grazing Plan area

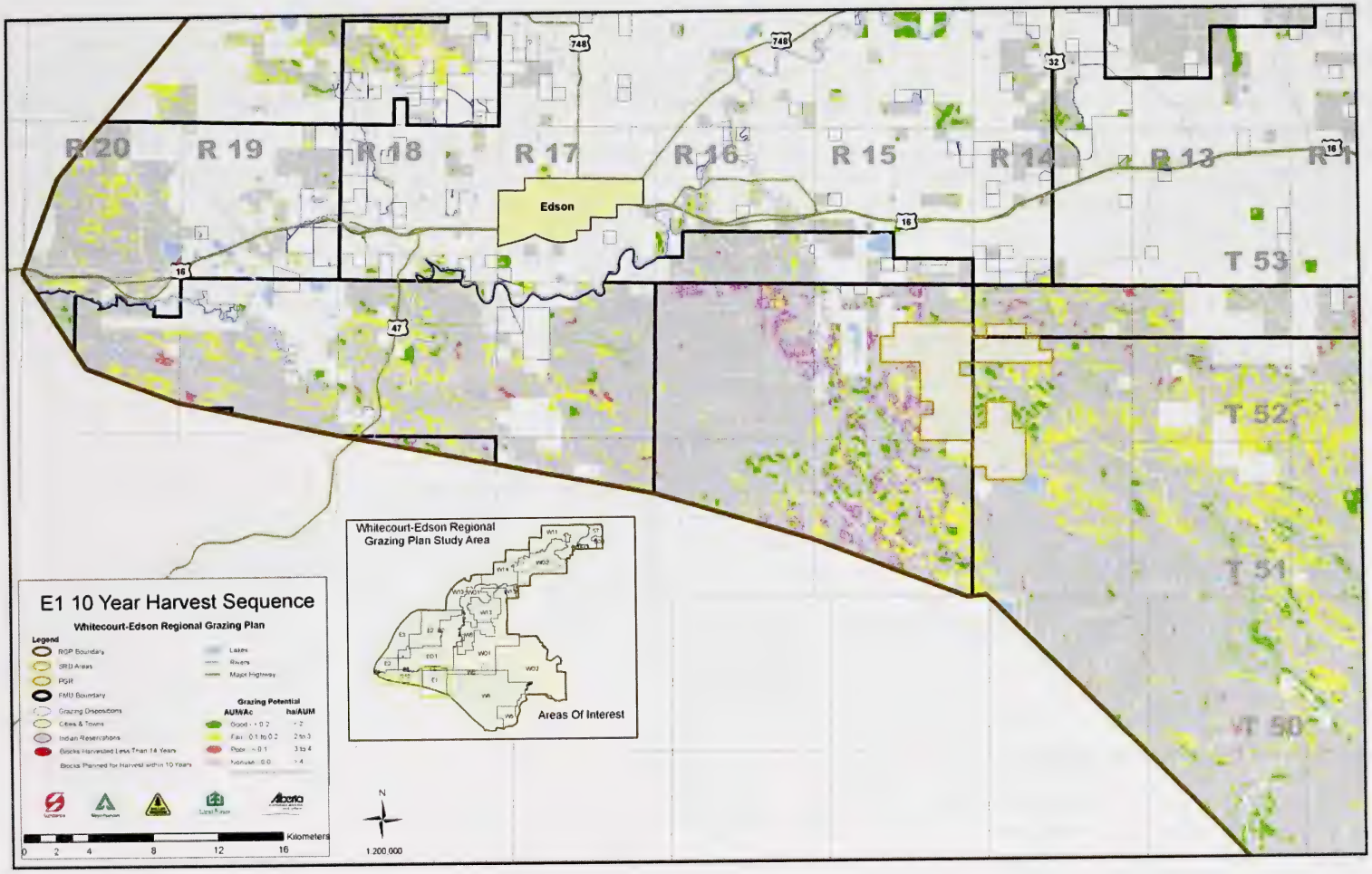
Forest Management Unit (FMU)	Company Name	Disposition Number	Coniferous AAC		Deciduous AAC		Comments
			% Share	(m^3/ year)	% Share	(m^3/ year)	
E01	Weyerhaeuser Edson	FMA 9700035	96.59	74 858	100	36 305	Including 100% of any incidental deciduous or coniferous generated.
	Edson Timber Products	CTQ E010005 and CTQ E01F001	3.41	2 644	0	0	
E02	Weyerhaeuser Edson	FMA 9700035	14.91	6 570	97.3	54 058	Including 100% of any incidental deciduous and 20% of any incidental coniferous generated.
	EDFOR	CTQ E020002	78.6	34 640	0	0	Including 80% of any incidental coniferous generated.
	Edson Timber Community Program	Various CTPs	6.49	2 860	n/a	1 500	Fixed volume deciduous.
W05	Weyerhaeuser Edson	FMA 9700035	0	0	80.38	16 386	
	Cold Creek Community Timber Program	Various CTPs and DTPs	100	17 013	n/a	4 000	Including 100% of any incidental deciduous or coniferous generated. Fixed volume deciduous.

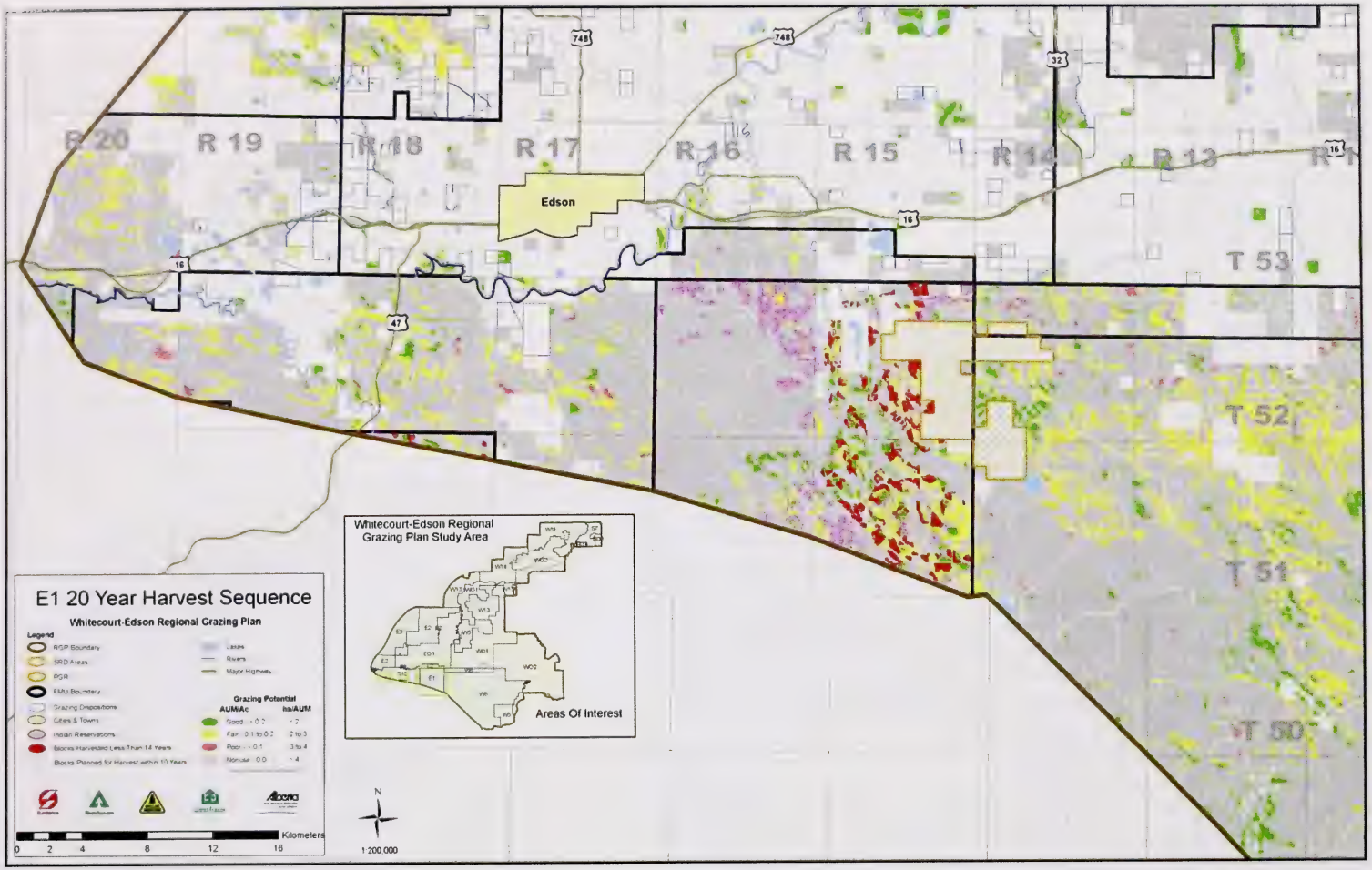
Forest Management Unit (FMU)	Company Name	Disposition Number	Coniferous AAC		Deciduous AAC		Comments
			% Share	(m^3/ year)	% Share	(m^3/ year)	
W06	Weyerhaeuser Edson	FMA 9700035	22.14	41 290	84.64	96 909	Including 100% of any incidental deciduous or coniferous generated.
	Millar Western Forest Products	CTQ W060002	0.7	1 306	0	0	
	Blue Ridge Lumber	CTQ W060010	18.87	35 186	0	0	
	Alberta Newsprint Company	CTQ W060011	43.14	80 456	0	0	
	Alberta Newsprint Company	CTP W060103	n/a	550 000	0	0	Fixed total volume.
E01, E02, W05, W06	Weyerhaeuser Edson	DTA E910001	0	0	100	17 835	
R13	Sundance Forest Products	FMA 970032	n/a	1 992 718	n/a	205 402	
	Medicine Lodge Timber Products	CTQ R130002	1.92	7 620	0	0	
	Precision	CTQ R130001	0.46	1 877	0	0	
	ECHO	CTQ R130004	2.58	11 078	0	0	

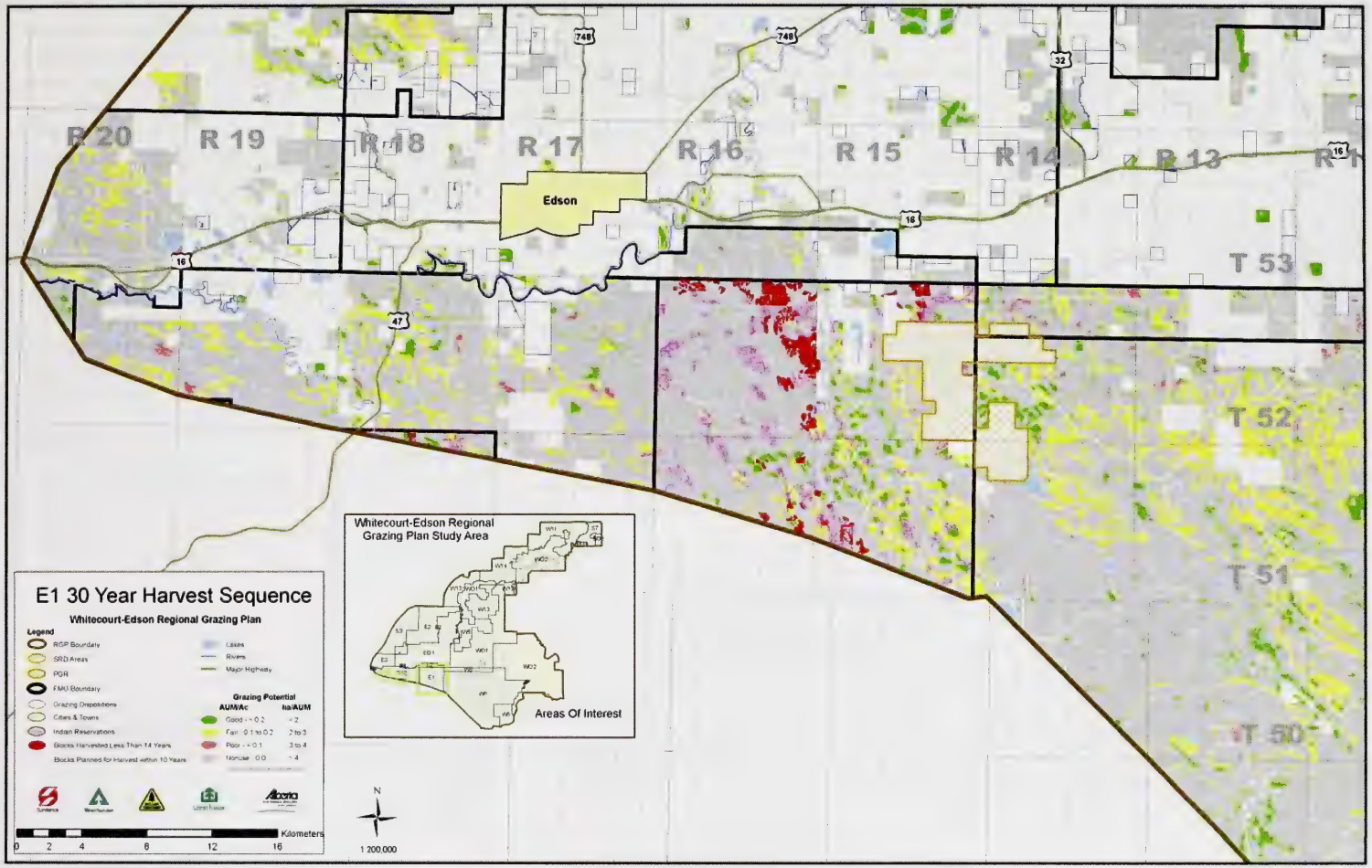
Forest Management Unit (FMU)	Company Name	Disposition Number	Coniferous AAC		Deciduous AAC		Comments
			% Share	(m^3/ year)	% Share	(m^3/ year)	
W11	Millar Western Forest Products	FMA 9700034	0	0	100	109 863	
	Spruceland Millworks	CTQ W110006	72.69	69 055	0	0	
	OK Lumber	CTQ W110005	21.05	19 998	0	0	
	Fort Assiniboine Lumber	CTQ W110004	6.26	5 947	0	0	
W13	Millar Western Forest Products	FMA 9700034	n/a	300 922	n/a	146 797	
	Millar Western Forest Products	CTQ W130001	100	1 824	0	0	100% of non-FMA conifer annual allowable cut within W13.
	Mostowich Lumber	CTQ W130002	4.42	15 388	0	0	
	Weyerhaeuser Edson	DTA W130001	0	0	n/a	45 000	Fixed volume of deciduous.
	Whitecourt Community Timber Program	Various CTPs	n/a	30 000	0	0	Fixed volume of coniferous.

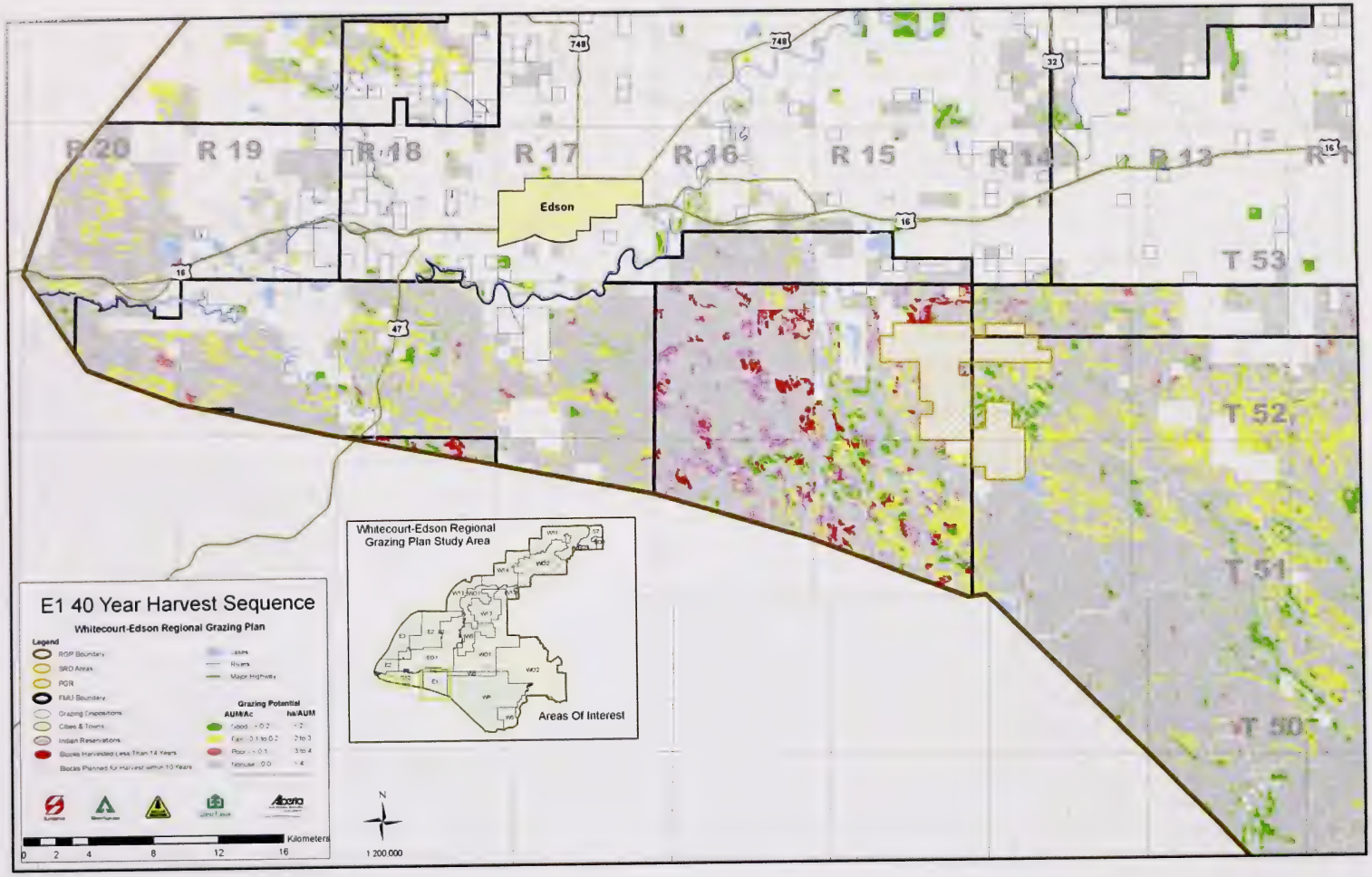
Forest Management Unit (FMU)	Company Name	Disposition Number	Coniferous AAC		Deciduous AAC		Comments
			% Share	(m^3/ year)	% Share	(m^3/ year)	
E3	Hinton Wood Products	FMA 8800025	n/a	1 500 000	0	0	AAC is for the entire FMA.
W14	Blue Ridge Lumber	FMA 750020	n/a	723 683	n/a	117 640	Coniferous from VSA1 and VSA 2; Deciduous from mixedwood stands in VSA 2 only.
	Millar Western Forest Products	DTA W910001	0	0	n/a	74 600	From pure deciduous stands in VSA 2.
	Millar Western Forest Products	DTA W910002	0	0	n/a	70 000	From pure deciduous stands in VSA 2.
	Whitecourt Community Timber Program	Various CTPs, DTPs, or LTPs	0.5	3 637	0.5	591	Deciduous from VSA 2 all but pure deciduous stands.

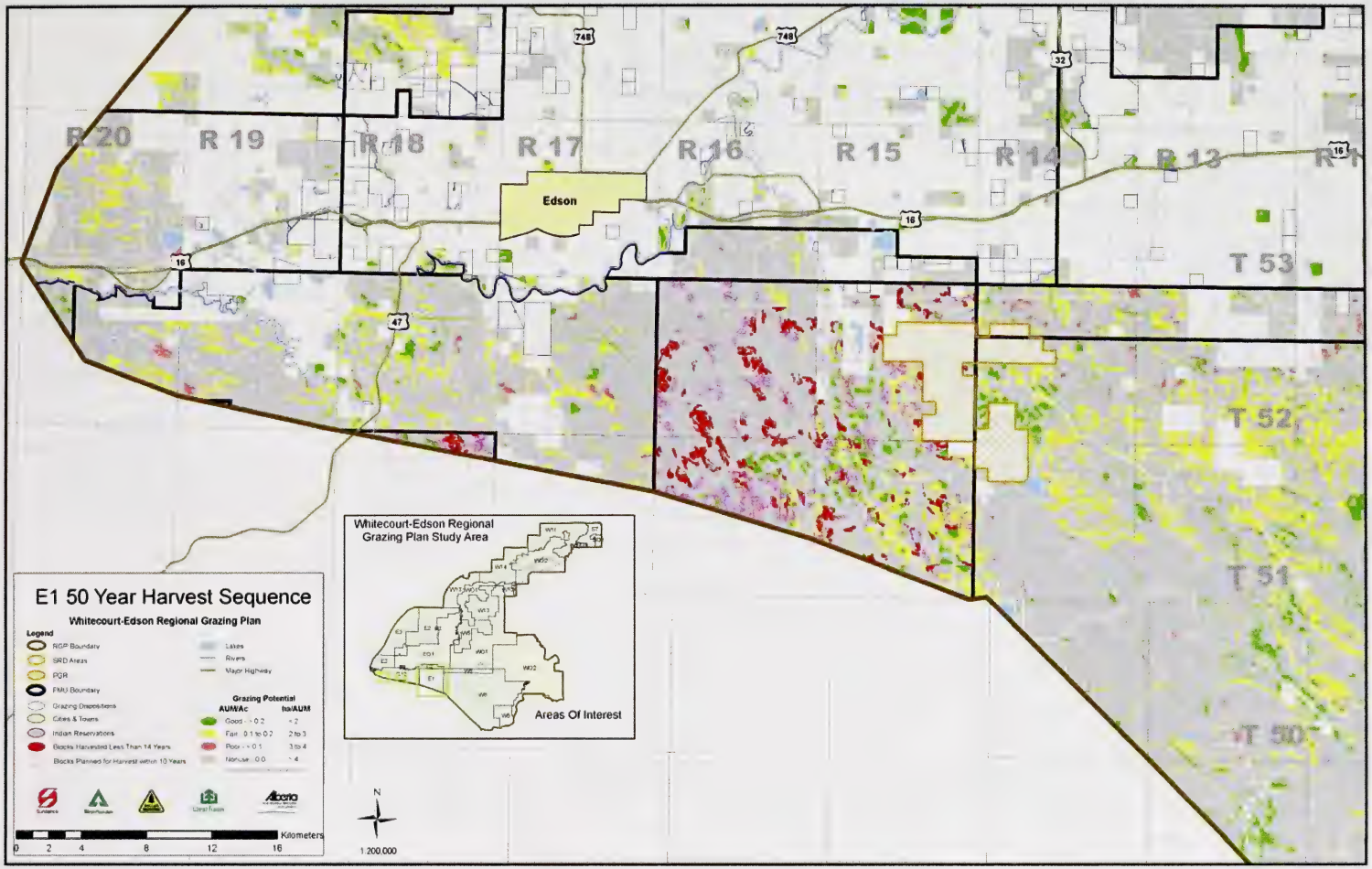
APPENDIX 4: FMU E1 Current and Projected Grazing Potential Maps

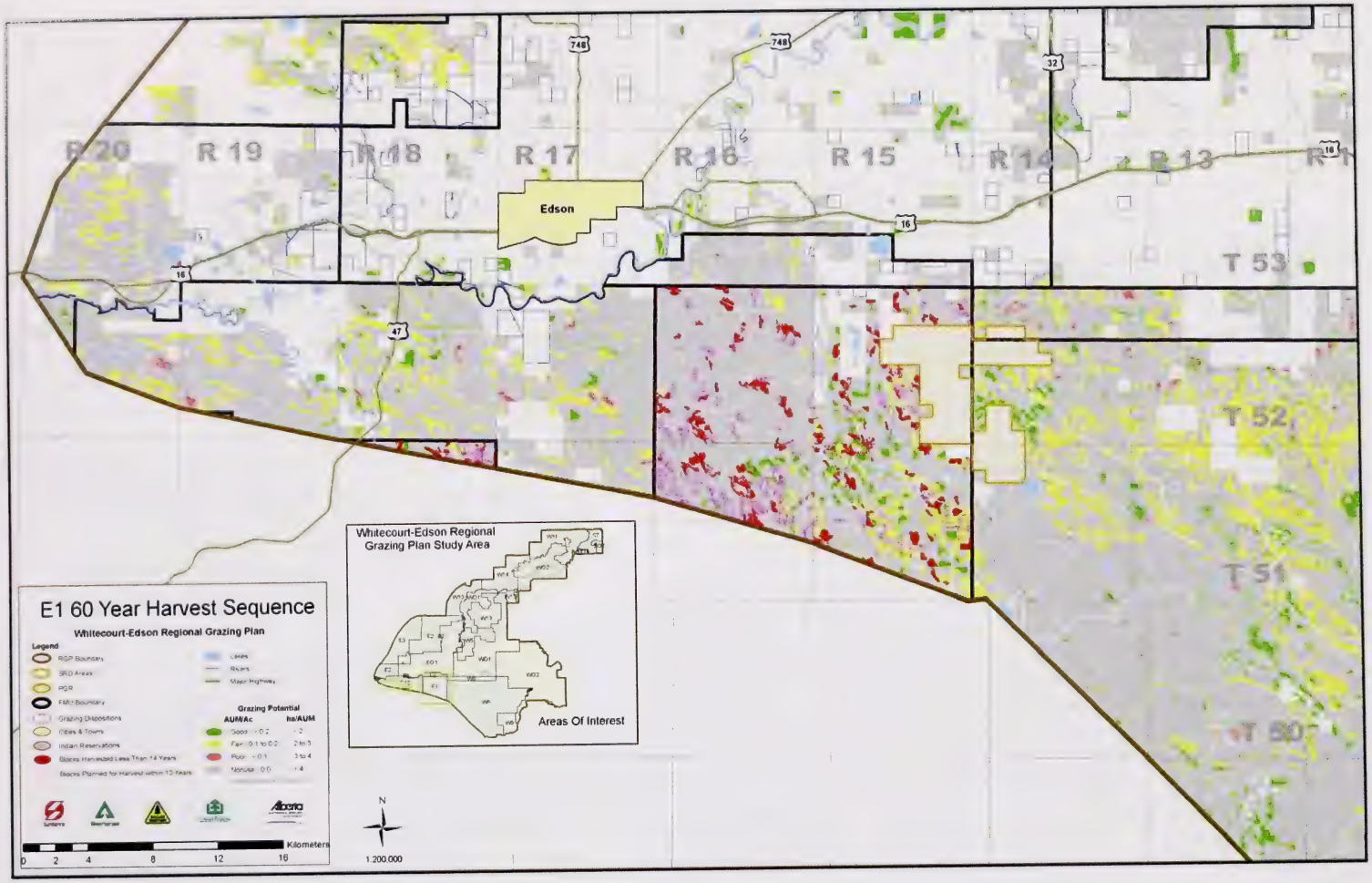



R 20
R 19
R 18
R 17
R 16
R 15
R 14
R 13
Edson
T 53
T 52
T 51
T 50
748
32
16
47
E1 20 Year Harvest Sequence
Whitecourt-Edson Regional Grazing Plan
Legend
Grazing Potential
AUM/Ac
ha/AUM
Kilometers
0 2 4 8 12 16
Whitecourt-Edson Regional
Grazing Plan Study Area
Areas Of Interest
N
1:200,000

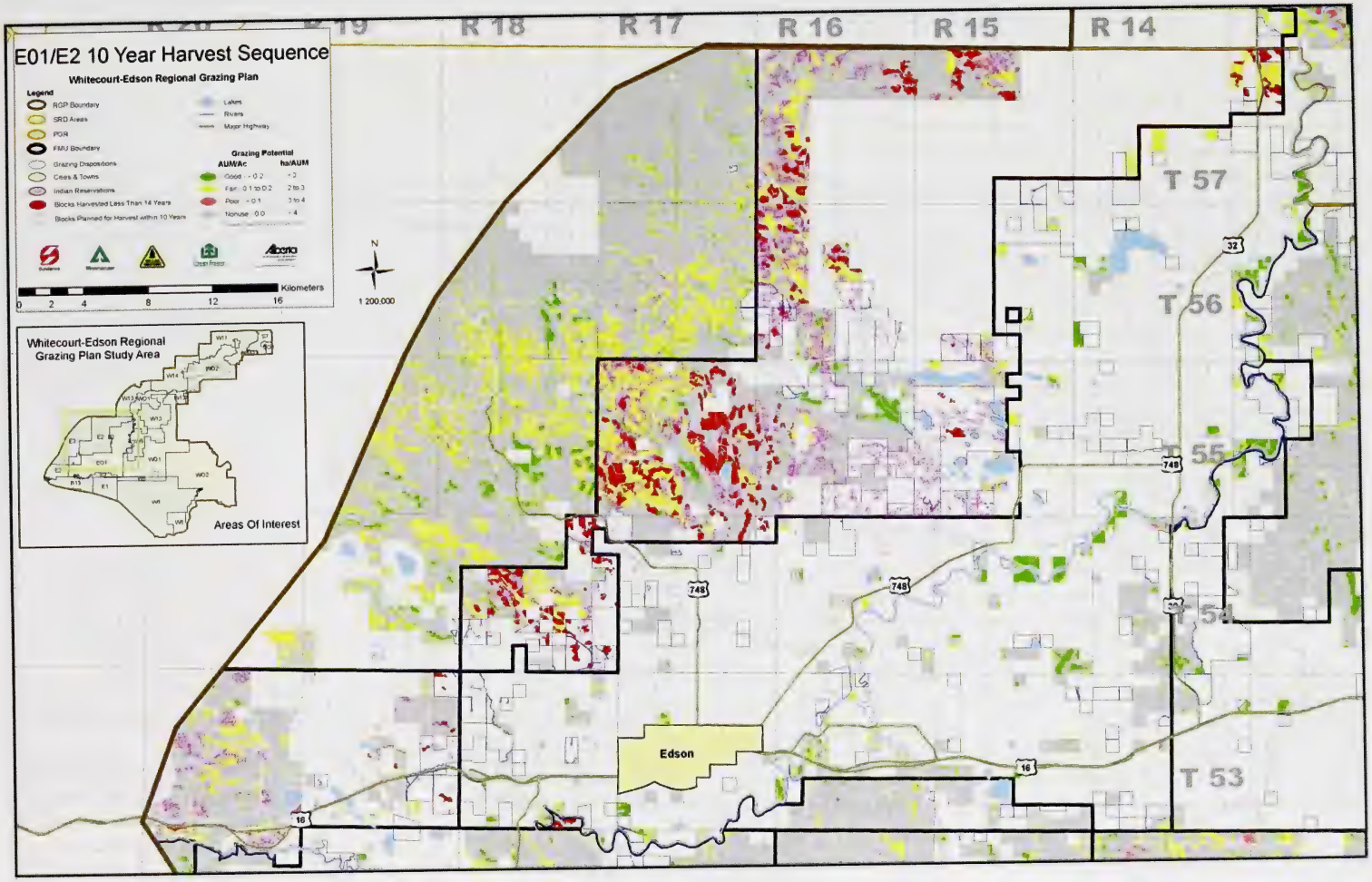

R 20
R 19
R 18
R 17
R 16
R 15
R 14
R 13
Edson
T 53
T 52
T 51
T 50
748
32
16
47
E1 30 Year Harvest Sequence
Whitecourt-Edson Regional Grazing Plan
Legend
RGP Boundary
SRD Areas
PGR
FMU Boundary
Grazing Dispositions
Cities & Towns
Indian Reservations
Blocks Harvested Less Than 14 Years
Blocks Planned for Harvest within 10 Years
Lakes
Rivers
Major Highway
Grazing Potential
AUM/Ac
ha/AUM
Good - > 0.2
< 2
Fair 0.1 to 0.2
2 to 3
Poor - > 0.1
3 to 4
Nonuse 0.0
> 4
Kilometers
0 2 4 8 12 16
Whitecourt-Edson Regional
Grazing Plan Study Area
Areas Of Interest
N
1:200,000

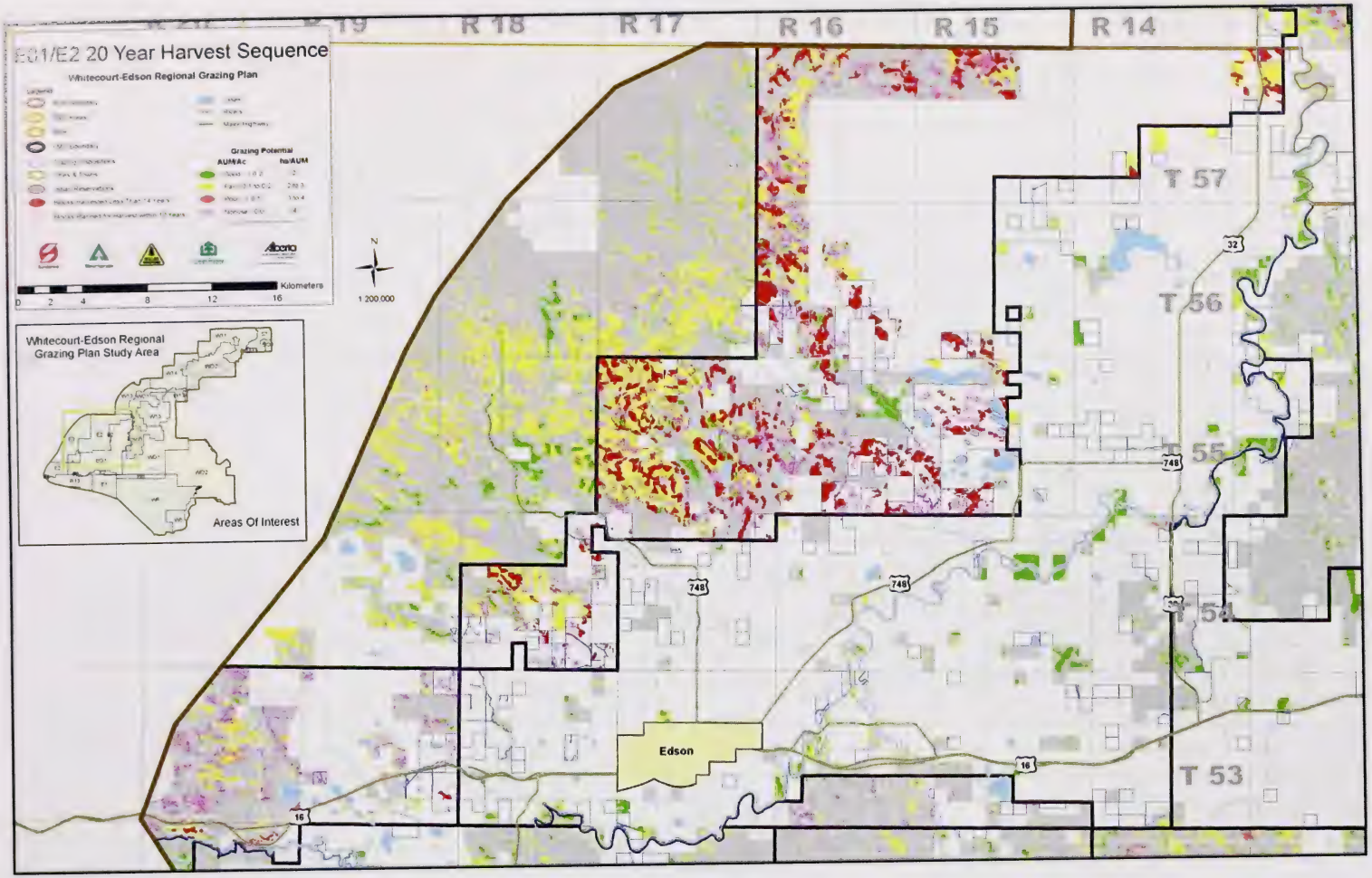

R 20
R 19
R 18
R 17
R 16
R 15
R 14
R 13
Edson
T 53
T 52
T 51
T 50
E1 40 Year Harvest Sequence
Whitecourt-Edson Regional Grazing Plan
Legend
Grazing Potential
AUM/Ac
ha/AUM
Kilometers
0 2 4 8 12 16
Whitecourt-Edson Regional
Grazing Plan Study Area
Areas Of Interest
N
1:200,000

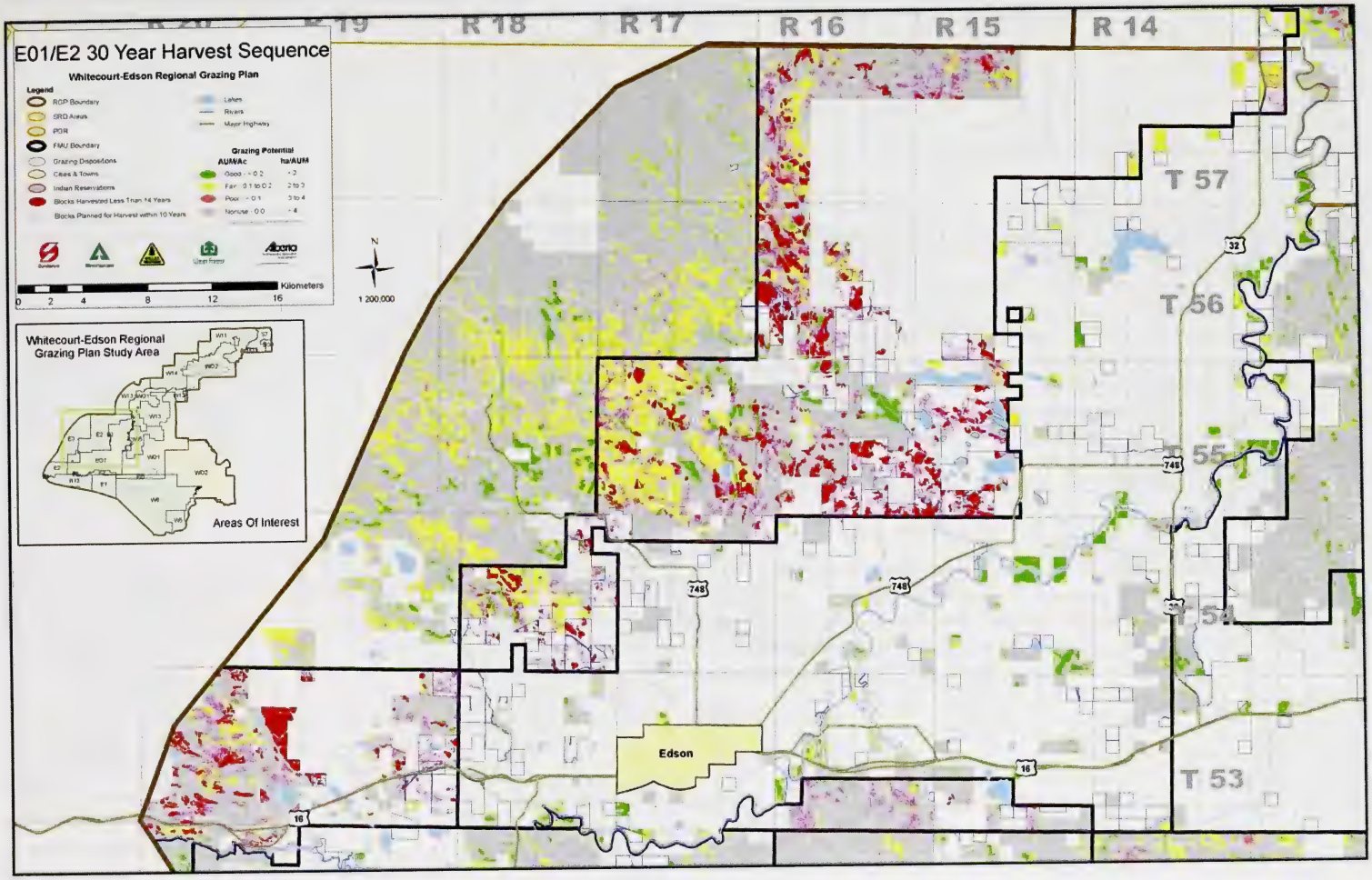

R 20
R 19
R 18
R 17
R 16
R 15
R 14
R 13
T 53
T 52
T 51
T 50
Edson
748
748
32
16
16
18
47
E1 50 Year Harvest Sequence
Whitecourt-Edson Regional Grazing Plan
Legend
RGP Boundary
SRD Areas
PQR
FMU Boundary
Grazing Dispositions
Cities & Towns
Indian Reservations
Blocks Harvested Less Than 14 Years
Blocks Planned for Harvest within 10 Years
Lakes
Rivers
Major Highway
Grazing Potential
AUM/Ac
ha/AUM
Good
Fair
Poor
Kilometers
0 2 4 8 12 16
Whitecourt-Edson Regional
Grazing Plan Study Area
Areas Of Interest
N
1:200,000

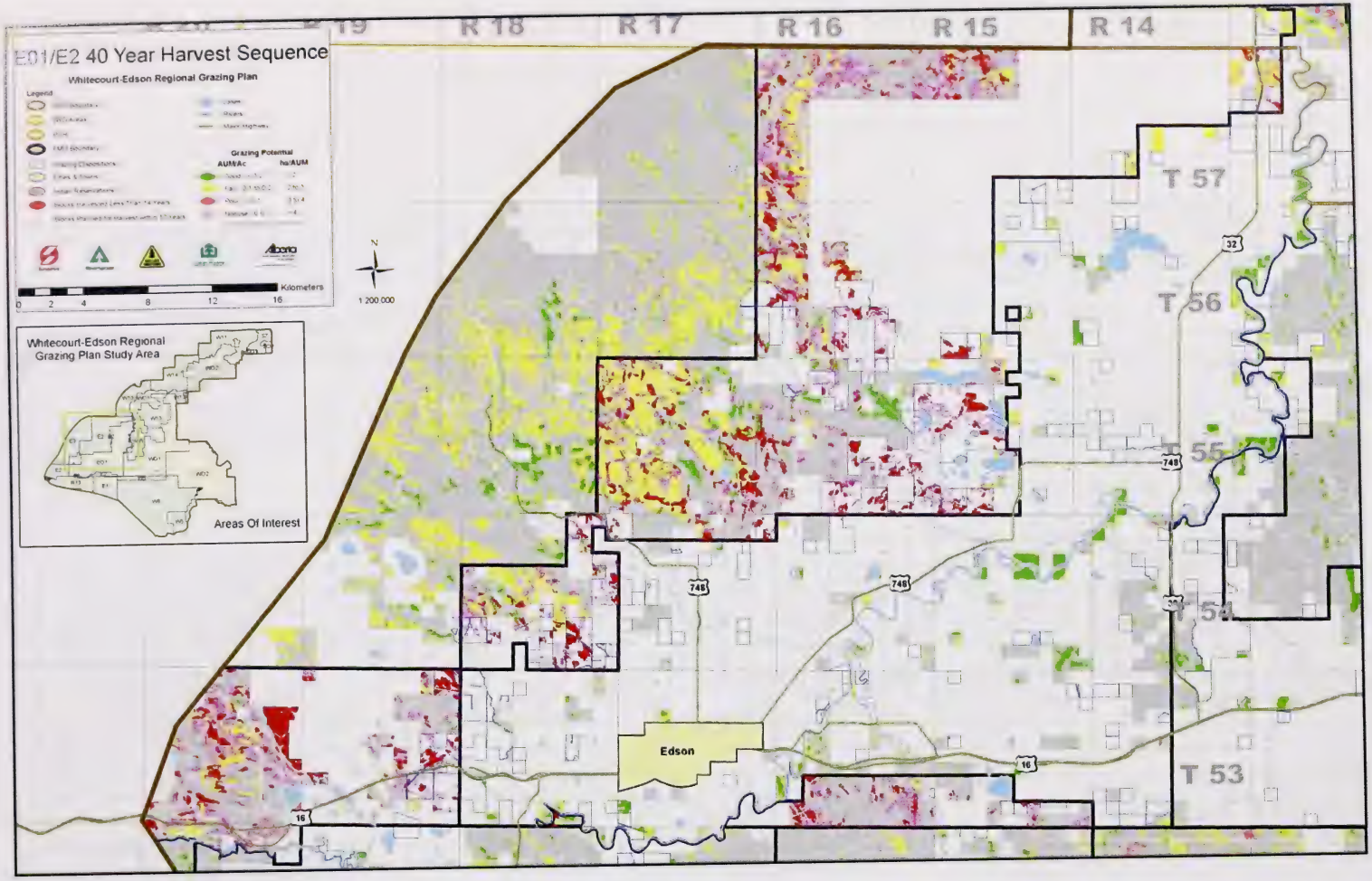

R 20
R 19
R 18
R 17
R 16
R 15
R 14
R 13
Edson
T 53
T 52
T 51
T 50
748
32
16
47
E1 60 Year Harvest Sequence
Whitecourt-Edson Regional Grazing Plan
Legend
Grazing Potential
AUM/Ac
ha/AUM
Kilometers
0 2 4 8 12 16
Whitecourt-Edson Regional
Grazing Plan Study Area
Areas Of Interest
N
1:200,000

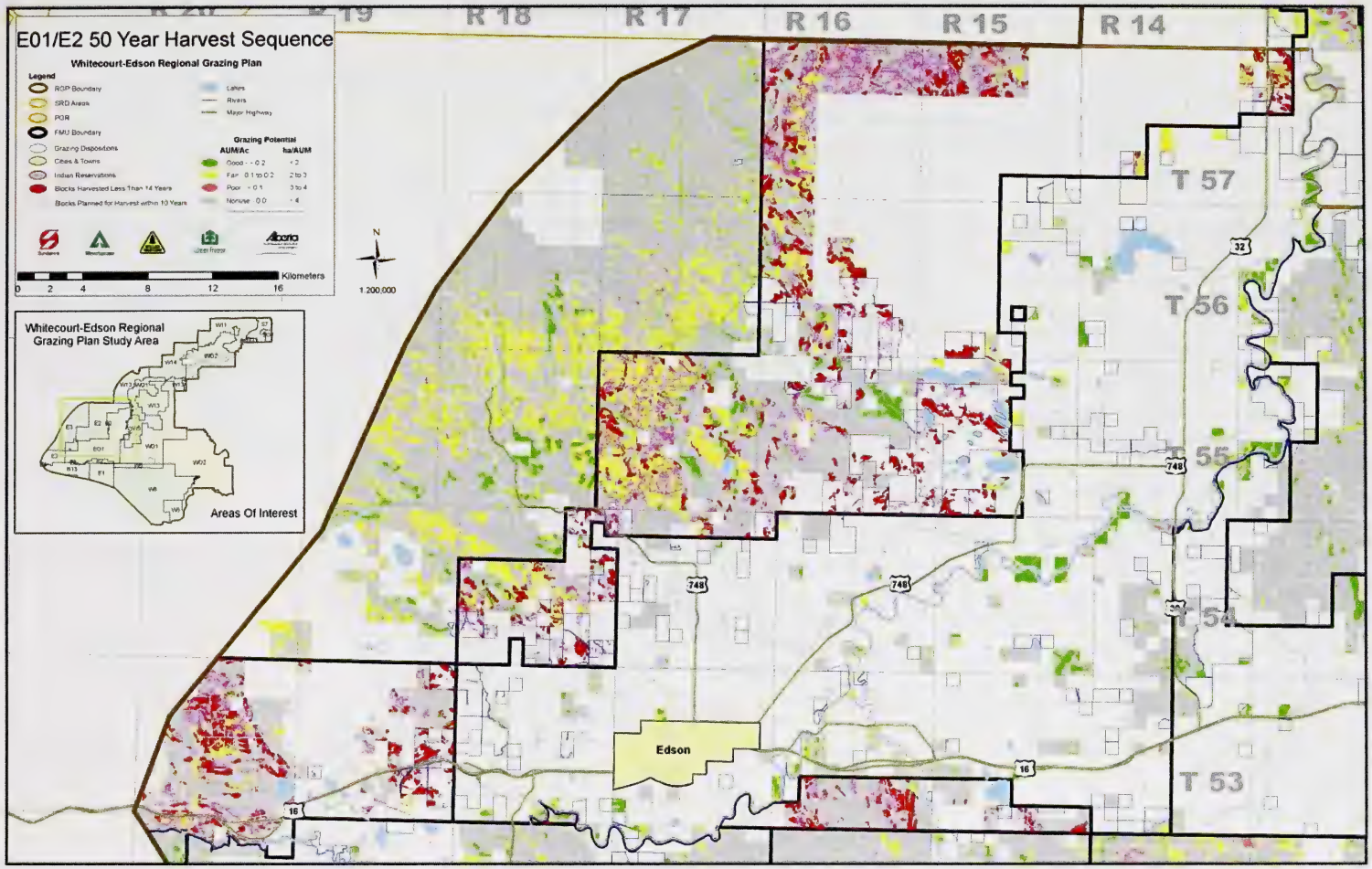
APPENDIX 5: FMU E01 and E2 Current and Projected Grazing Potential Maps

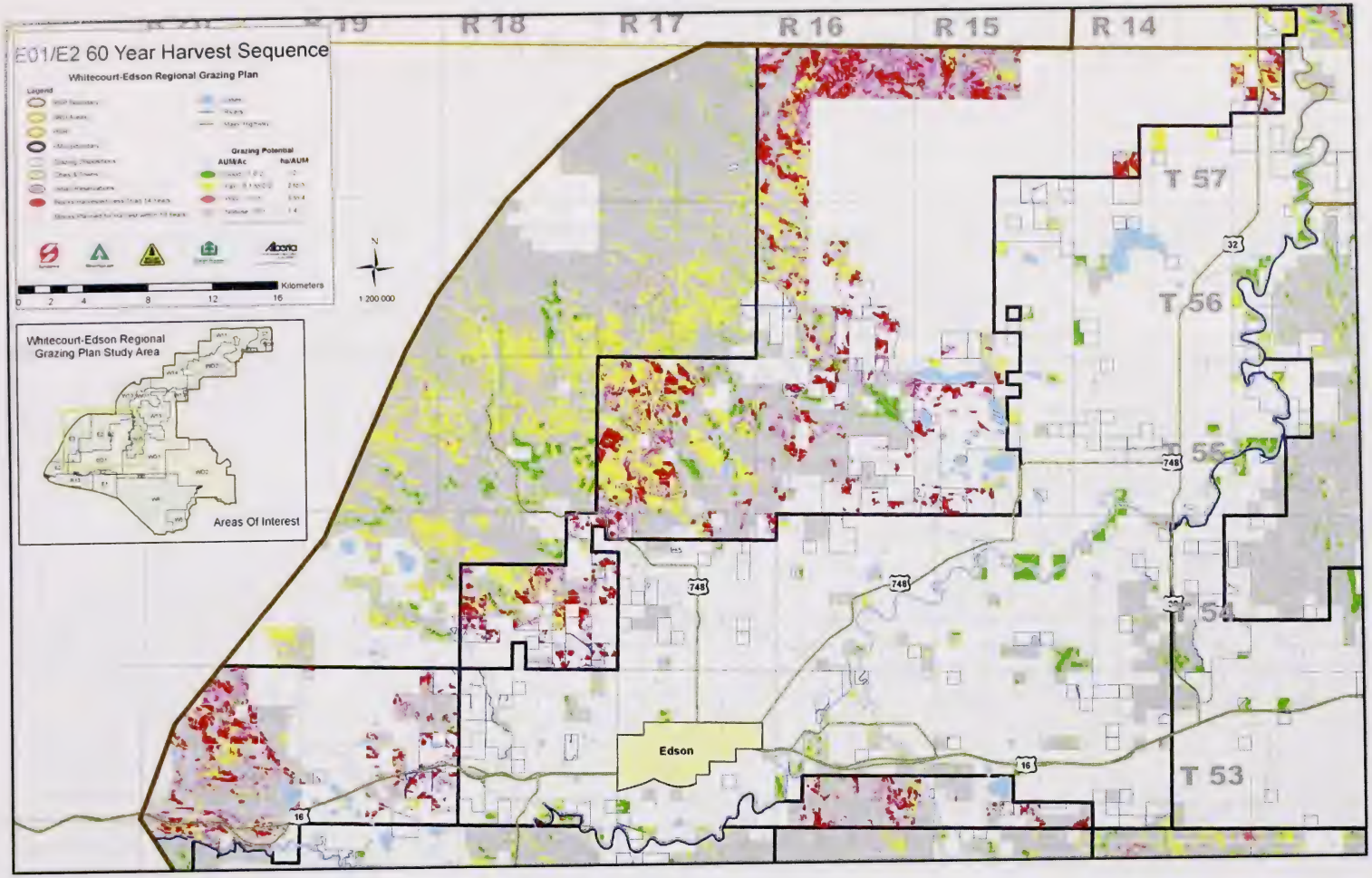



E01/E2 20 Year Harvest Sequence
Whitecourt-Edson Regional Grazing Plan
Grazing Potential
AUM/Ac
ha/AUM
Kilometers
0 2 4 8 12 16
N
1:200,000
Whitecourt-Edson Regional Grazing Plan Study Area
Areas Of Interest
R 19
R 18
R 17
R 16
R 15
R 14
T 57
T 56
T 55
T 54
T 53
32
748
16
Edson

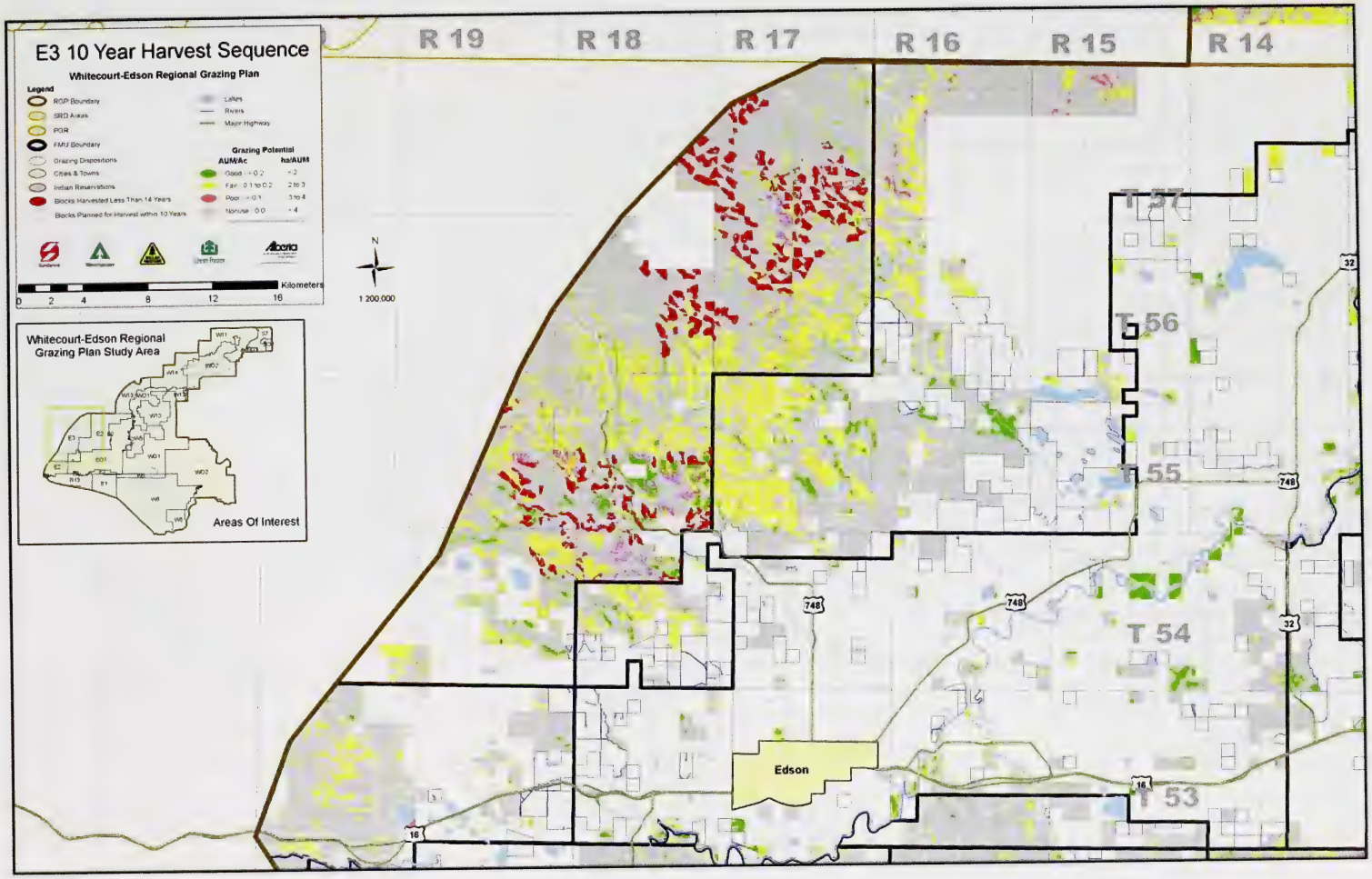

E01/E2 30 Year Harvest Sequence
Whitecourt-Edson Regional Grazing Plan
Legend
RGP Boundary
SRD Areas
PDR
FMU Boundary
Grazing Dispositions
Cities & Towns
Indian Reservations
Blocks Harvested Less Than 14 Years
Blocks Planned for Harvest within 10 Years
Lakes
Rivers
Major Highway
Grazing Potential
AUM/Ac
ha/AUM
Good
Fair
Poor
Nonuse
Kilometers
0 2 4 8 12 16
1:200,000
Whitecourt-Edson Regional Grazing Plan Study Area
Areas Of Interest
R 18
R 17
R 16
R 15
R 14
T 57
T 56
T 55
T 54
T 53
Edson
748
32
16


E01/E2 40 Year Harvest Sequence
Whitecourt-Edson Regional Grazing Plan
Legend
Grazing Potential
AUM/Ac
ha/AUM
Kilometers
0 2 4 8 12 16
N
1:200,000
Whitecourt-Edson Regional Grazing Plan Study Area
Areas Of Interest
R 18
R 17
R 16
R 15
R 14
T 57
T 56
T 55
T 54
T 53
Edson
16
748
32

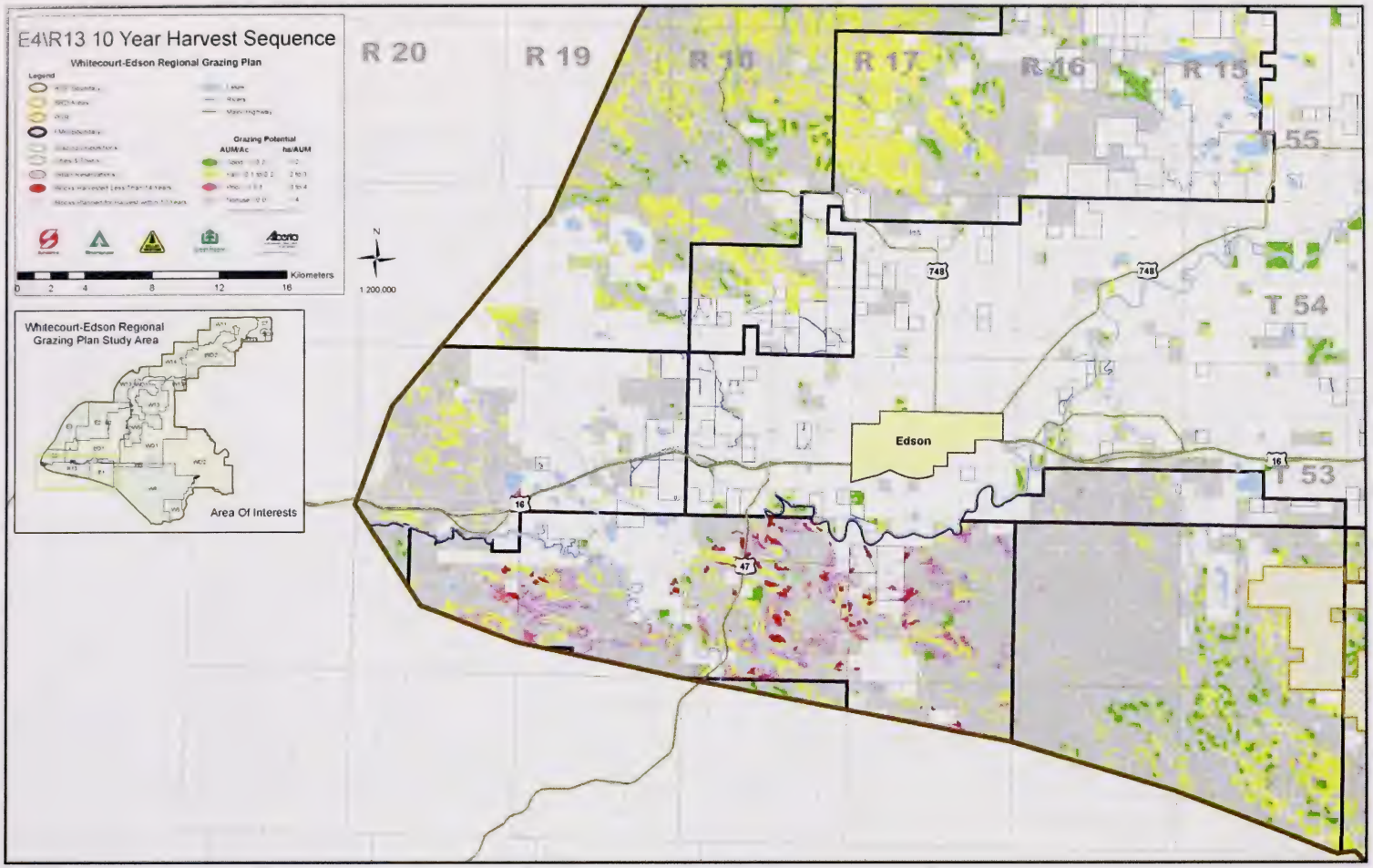

E01/E2 50 Year Harvest Sequence
Whitecourt-Edson Regional Grazing Plan
Legend
ROP Boundary
SRD Areas
PGR
FMU Boundary
Grazing Dispositions
Cities & Towns
Indian Reservations
Blocks Harvested Less Than 14 Years
Blocks Planned for Harvest within 10 Years
Lakes
Rivers
Major Highway
Grazing Potential
AUM/Ac
ha/AUM
Good - - 0.2
< 2
Fair 0.1 to 0.2
2 to 3
Poor - 0.1
3 to 4
Nonuse 0.0
> 4
Kilometers
0 2 4 8 12 16
N
1:200,000
Whitecourt-Edson Regional Grazing Plan Study Area
Areas Of Interest
R 19
R 18
R 17
R 16
R 15
R 14
T 57
T 56
T 55
T 54
T 53
32
748
Edson
16

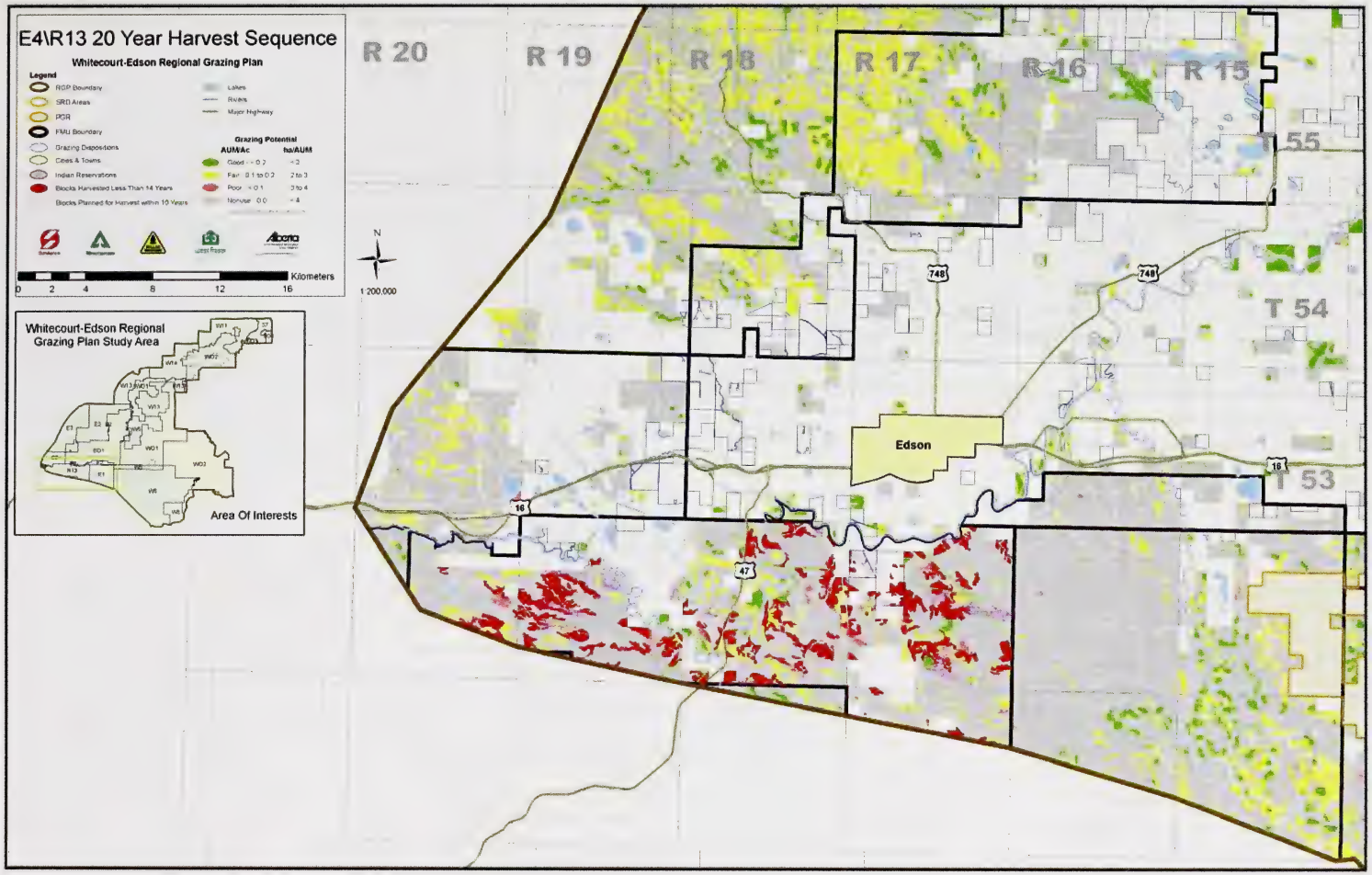

E01/E2 60 Year Harvest Sequence
Whitecourt-Edson Regional Grazing Plan
Legend
Grazing Potential
AUM/Ac
ha/AUM
Kilometers
0 2 4 8 12 16
1:200 000
Whitecourt-Edson Regional Grazing Plan Study Area
Areas Of Interest
R 19
R 18
R 17
R 16
R 15
R 14
T 57
T 56
T 55
T 54
T 53
Edson
748
16
32

APPENDIX 6: FMU E3 Current Grazing Potential Maps

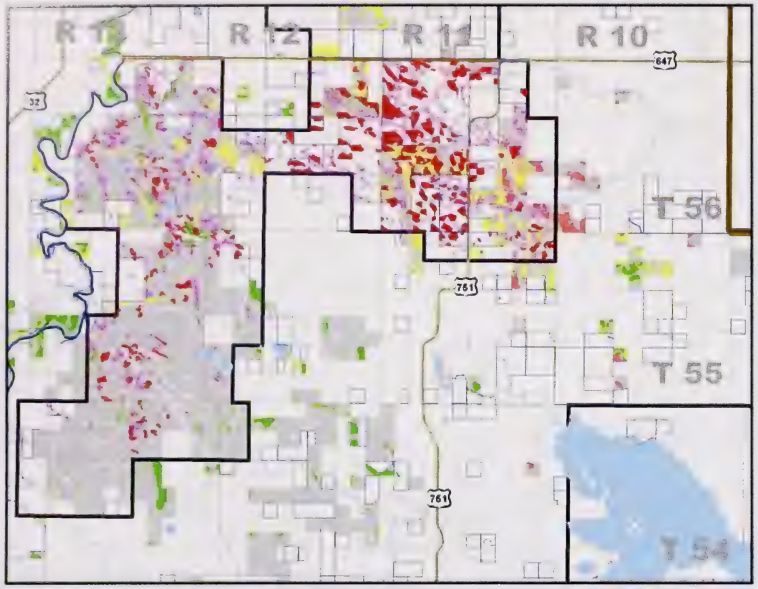


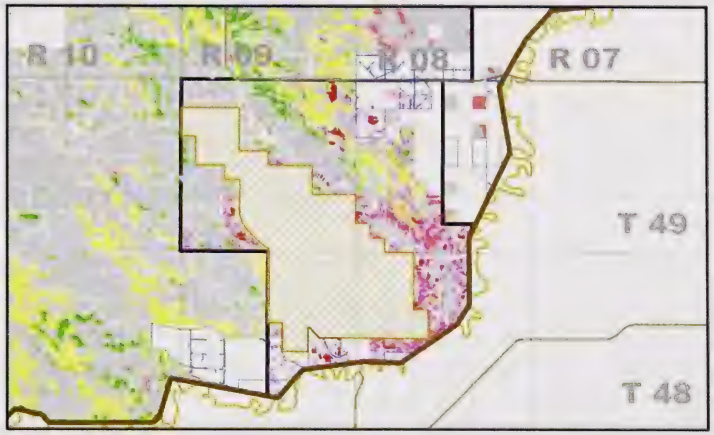
APPENDIX 7: FMU E4 and R13 Current and Projected Grazing Potential Maps

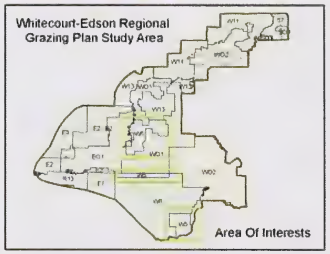


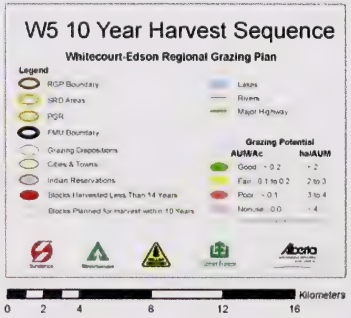

E4\R13 20 Year Harvest Sequence
Whitecourt-Edson Regional Grazing Plan
Legend
RGP Boundary
SRD Areas
PDR
FMU Boundary
Grazing Dispositions
Cities & Towns
Indian Reservations
Blocks Harvested Less Than 14 Years
Blocks Planned for Harvest within 10 Years
Lakes
Rivers
Major Highway
Grazing Potential
AUM/Ac
ha/AUM
Good > 0.2
< 3
Fair 0.1 to 0.2
3 to 4
Poor < 0.1
> 4
Nonuse 0.0
Kilometers
0 2 4 8 12 16
1:200,000
Whitecourt-Edson Regional Grazing Plan Study Area
Area Of Interests
R 20
R 19
R 18
R 17
R 16
R 15
55
T 54
T 53
Edson
748
16
18
47

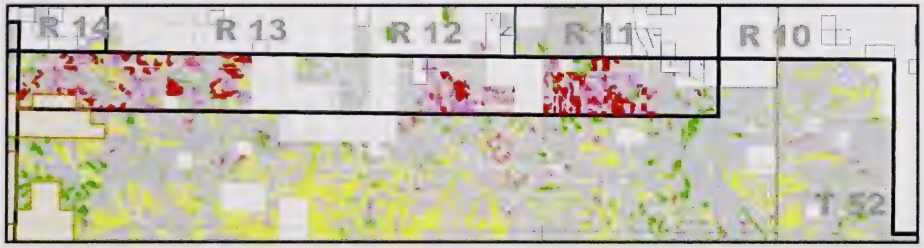
APPENDIX 8: FMU E5 Current and Projected Grazing Potential Maps

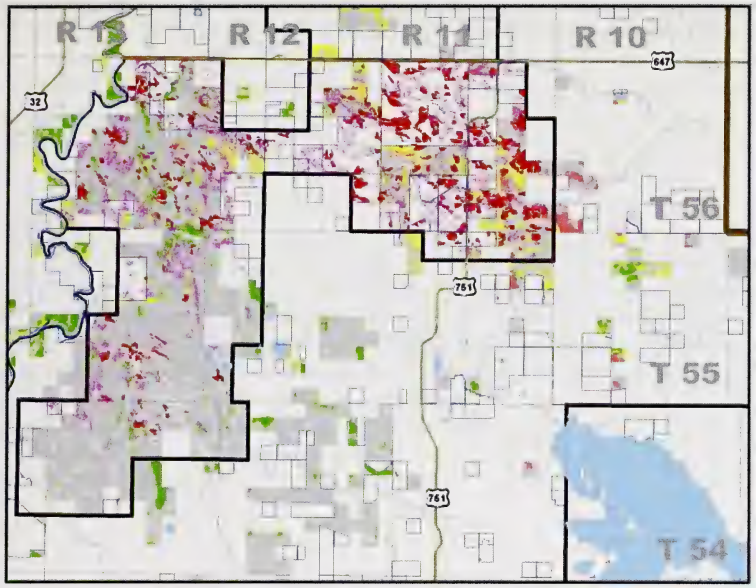


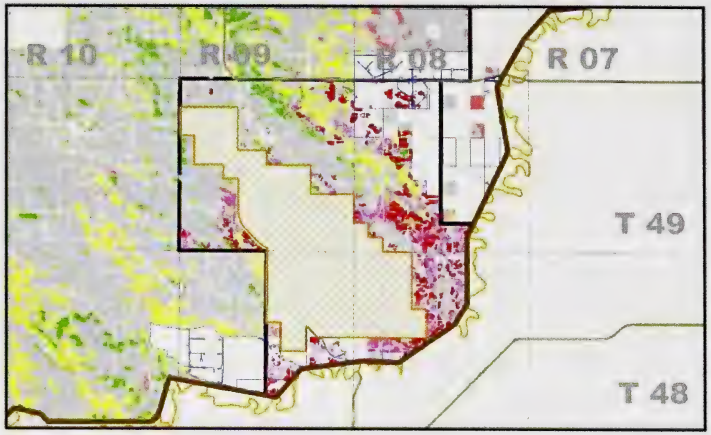


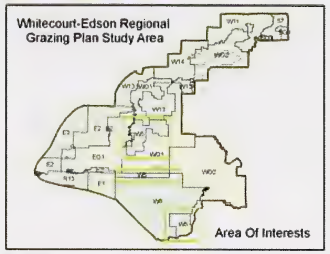


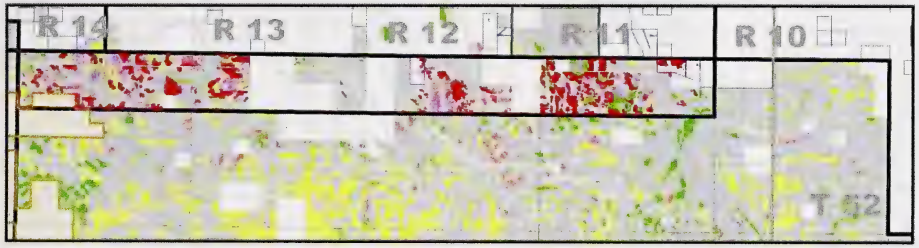


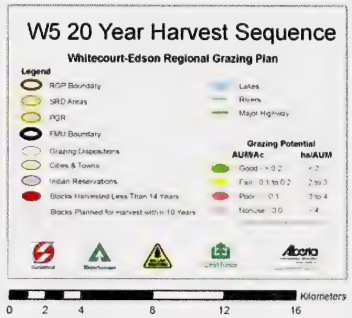


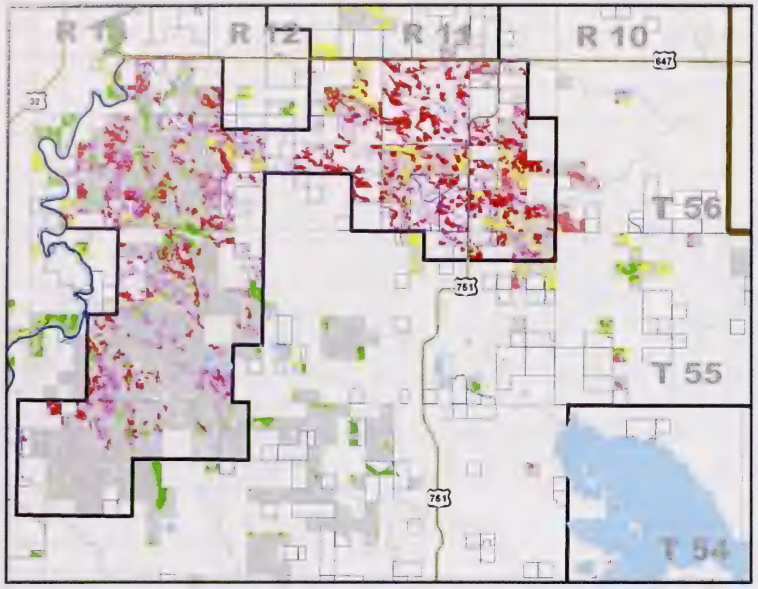

R 13
R 12
R 11
R 10
T 56
T 55
T 54

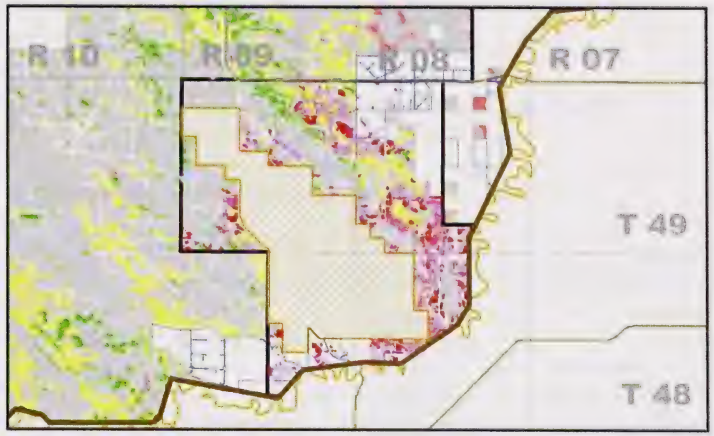

R 10
R 09
R 08
R 07
T 49
T 48

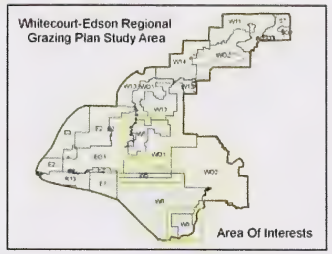

Whitecourt-Edson Regional
Grazing Plan Study Area
Area Of Interests

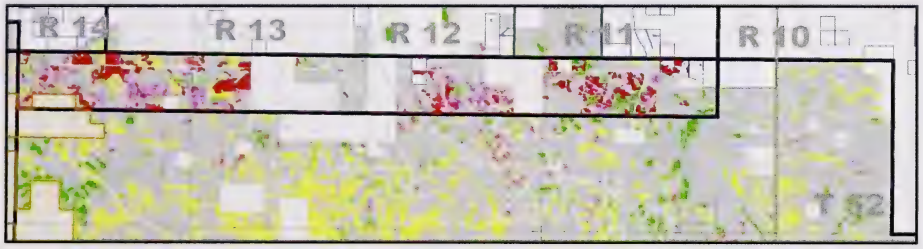

R 14
R 13
R 12
R 11
R 10
T 52

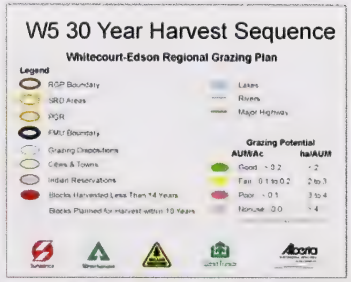

W5 20 Year Harvest Sequence
Whitecourt-Edson Regional Grazing Plan
Legend
Grazing Potential
AUM/Ac
ha/AUM
Kilometers
0 2 4 8 12 16

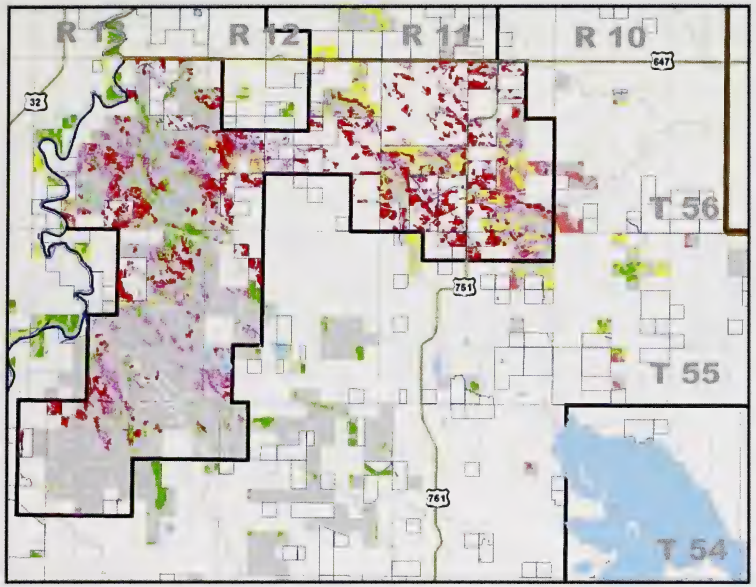

R 13
R 12
R 11
R 10
T 56
T 55
T 54

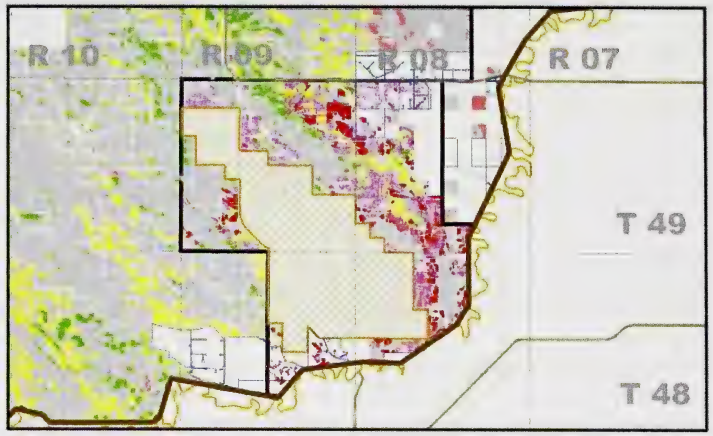

R 10
R 09
R 08
R 07
T 49
T 48

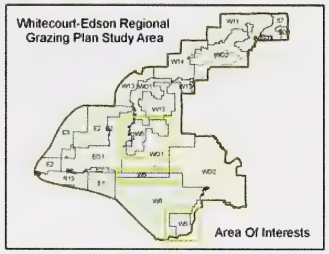

Whitecourt-Edson Regional
Grazing Plan Study Area
Area Of Interests

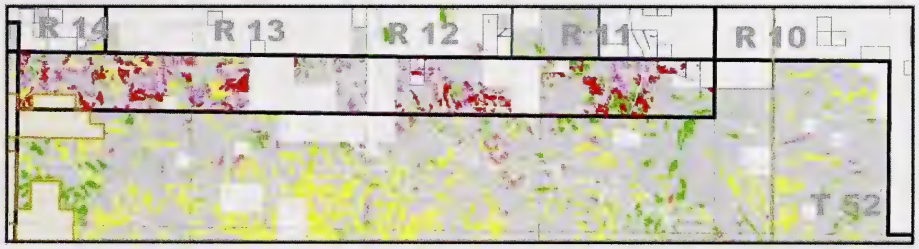

R 14
R 13
R 12
R 11
R 10
T 52

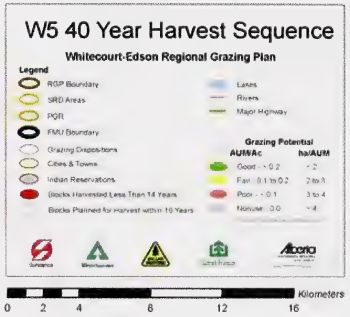

W5 30 Year Harvest Sequence
Whitecourt-Edson Regional Grazing Plan
Legend
Grazing Potential
AUM/Ac
ha/AUM
Good
Fair
Poor
Kilometers
0
2
4
8
12
16

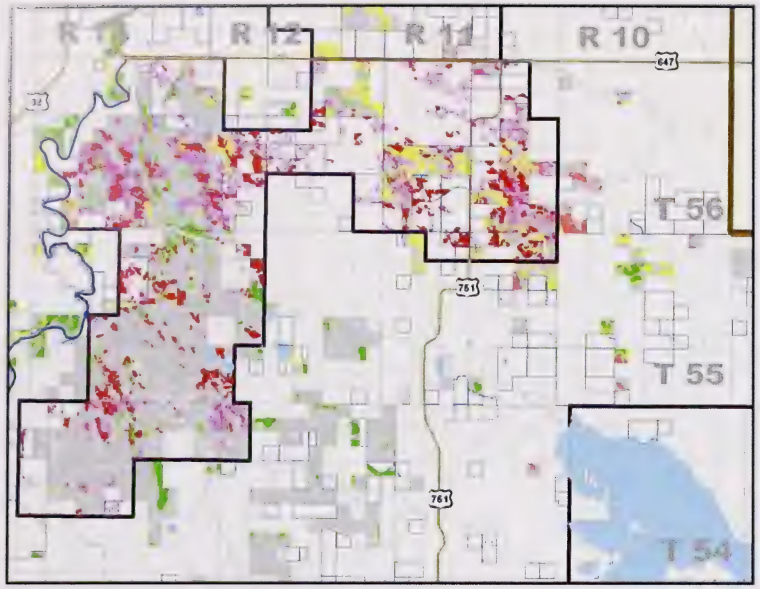

R 13
R 12
R 11
R 10
T 56
T 55
T 54

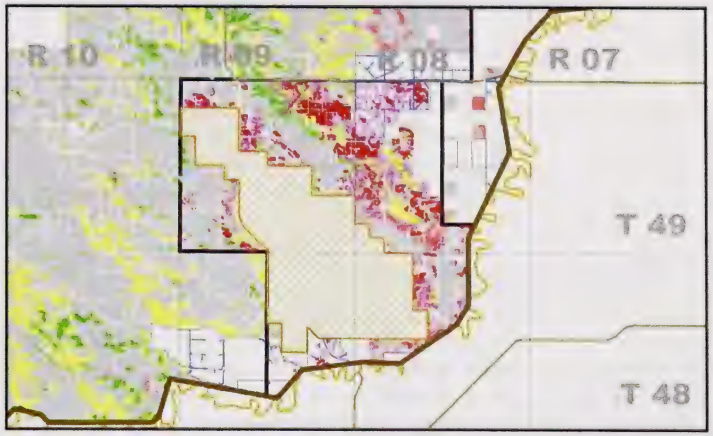

R 10
R 09
R 08
R 07
T 49
T 48

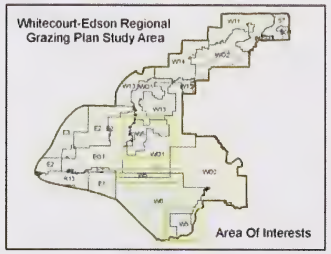

Whitecourt-Edson Regional
Grazing Plan Study Area
Area Of Interests

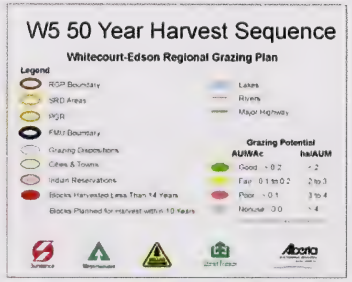

R 14
R 13
R 12
R 11
R 10
T 52

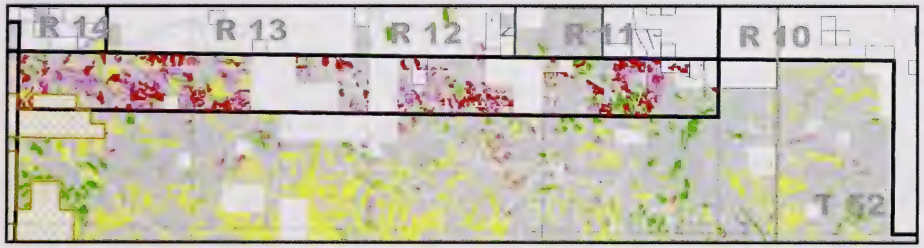

W5 40 Year Harvest Sequence
Whitecourt-Edson Regional Grazing Plan
Legend
RGP Boundary
SRD Areas
PQR
FMU Boundary
Grazing Dispositions
Cities & Towns
Indian Reservations
Blocks Harvested Less Than 14 Years
Blocks Planned for Harvest within 10 Years
Lakes
Rivers
Major Highway
Grazing Potential
AUM/Ac
ha/AUM
Good - > 0.2
Fair - 0.1 to 0.2
Poor - < 0.1
Non-use - 0.0
1:200,000
0 2 4 8 12 16
Kilometers

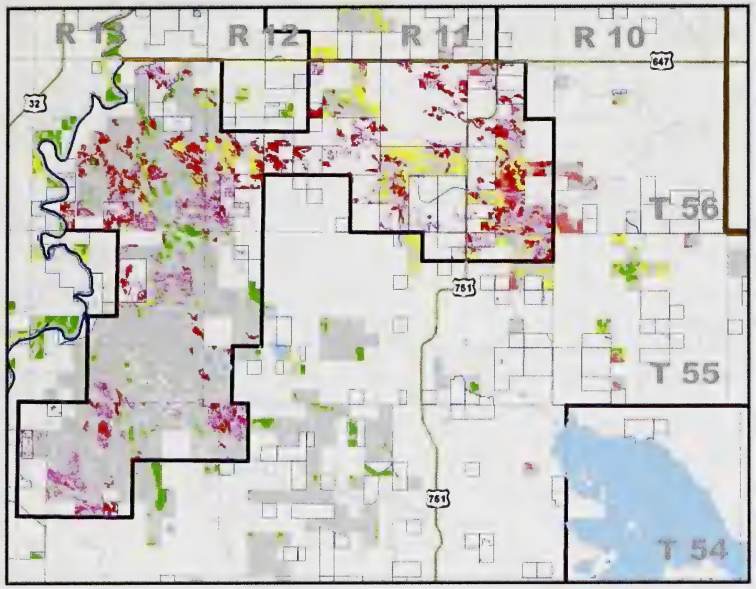

R 13
R 12
R 11
R 10
T 56
T 55
T 54

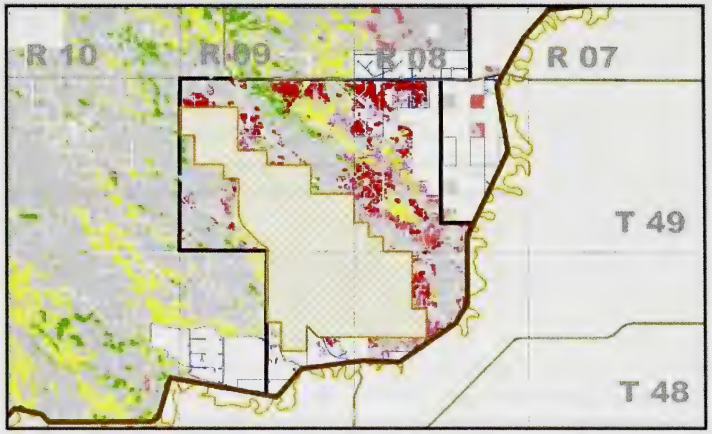

R 10
R 09
R 08
R 07
T 49
T 48

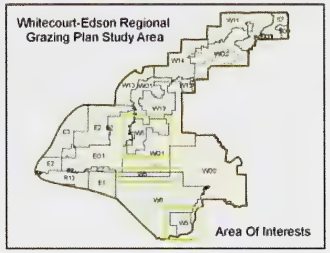

Whitecourt-Edson Regional
Grazing Plan Study Area
Area Of Interests

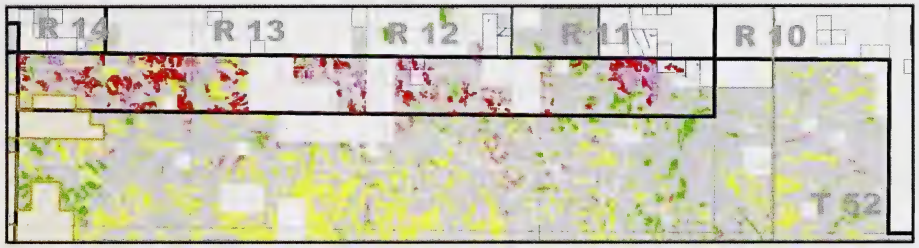

W5 50 Year Harvest Sequence
Whitecourt-Edson Regional Grazing Plan
Legend
Lakes
Rivers
Major Highways
Grazing Potential
AU/Ac
ha/AUM
Kilometers

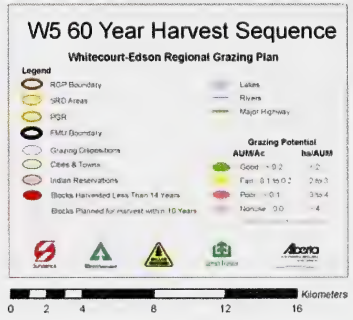

R 14
R 13
R 12
R 11
R 10
T 52


R 13
R 12
R 11
R 10
T 56
T 55
T 54
32
761
761
647

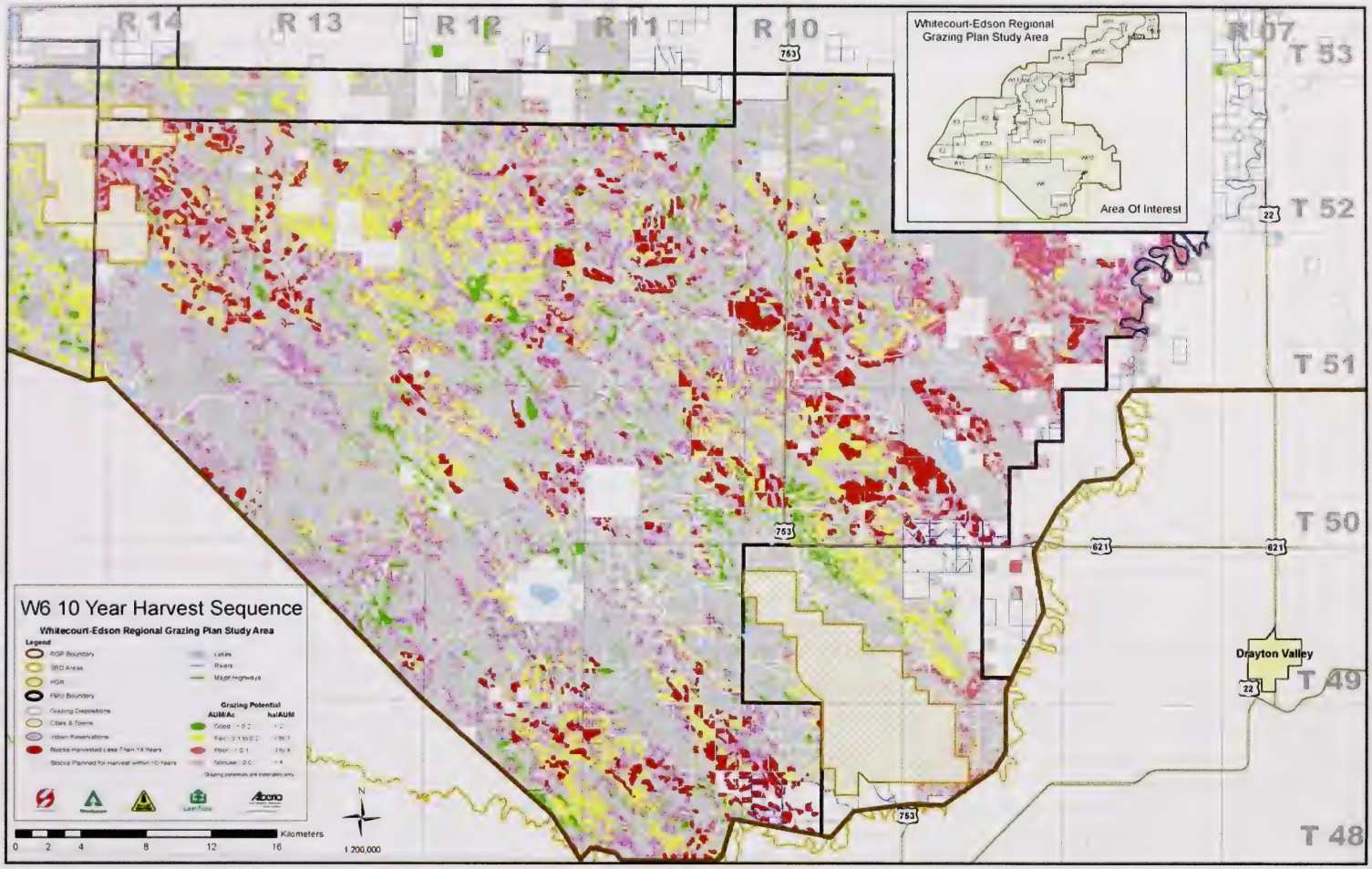

R 10
R 09
R 08
R 07
T 49
T 48

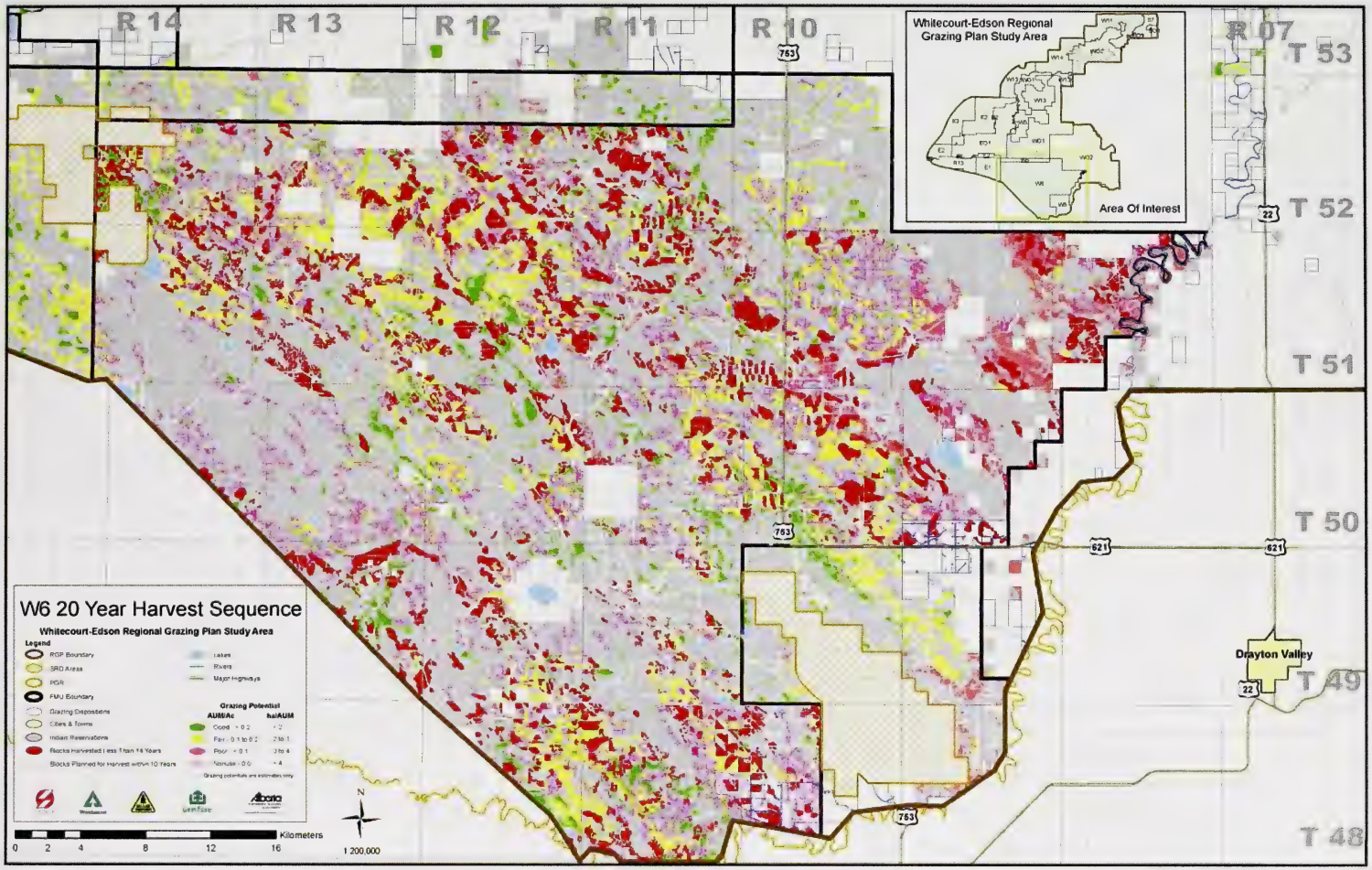

Whitecourt-Edson Regional
Grazing Plan Study Area
Area Of Interests

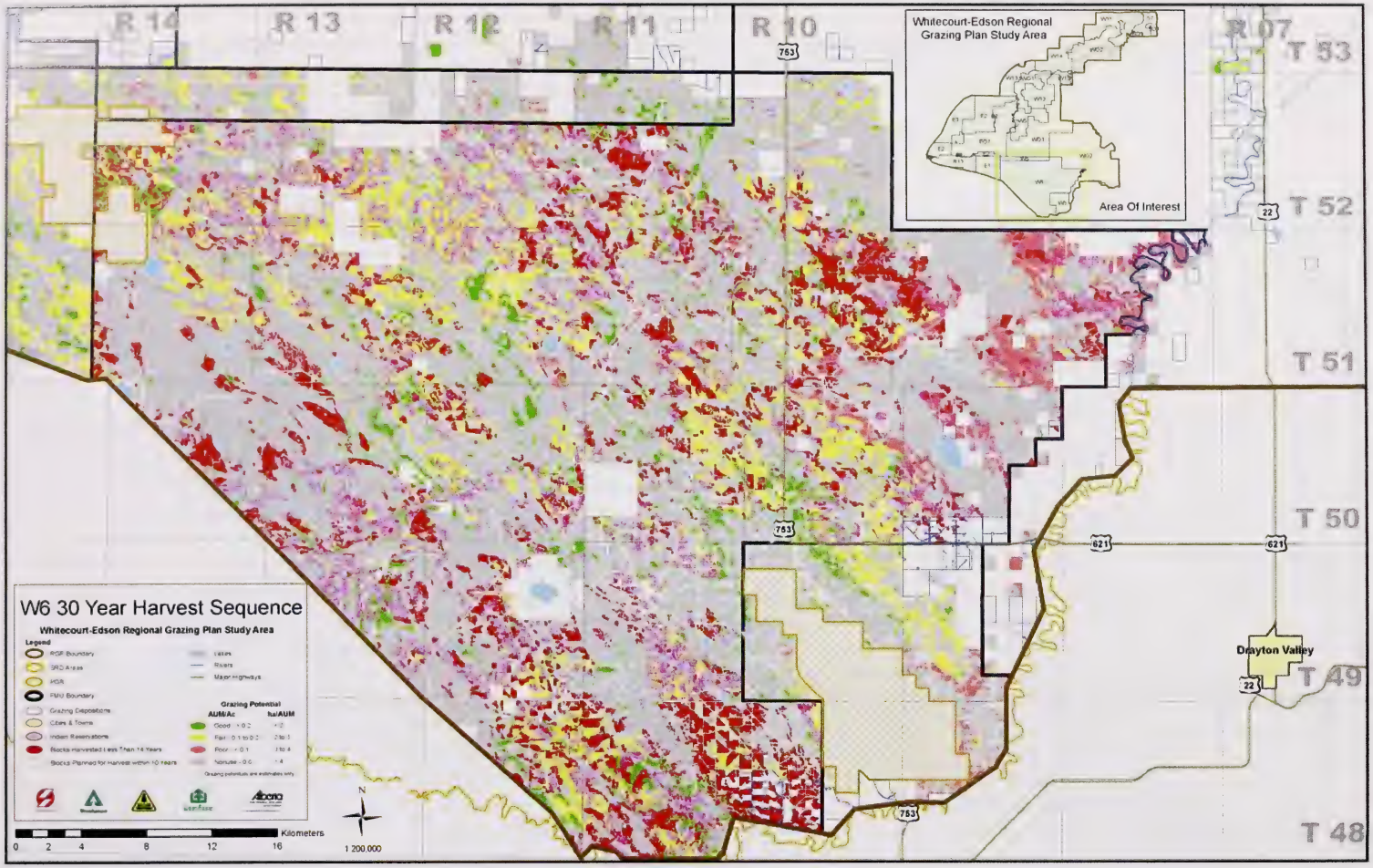

R 14
R 13
R 12
R 11
R 10
T 52

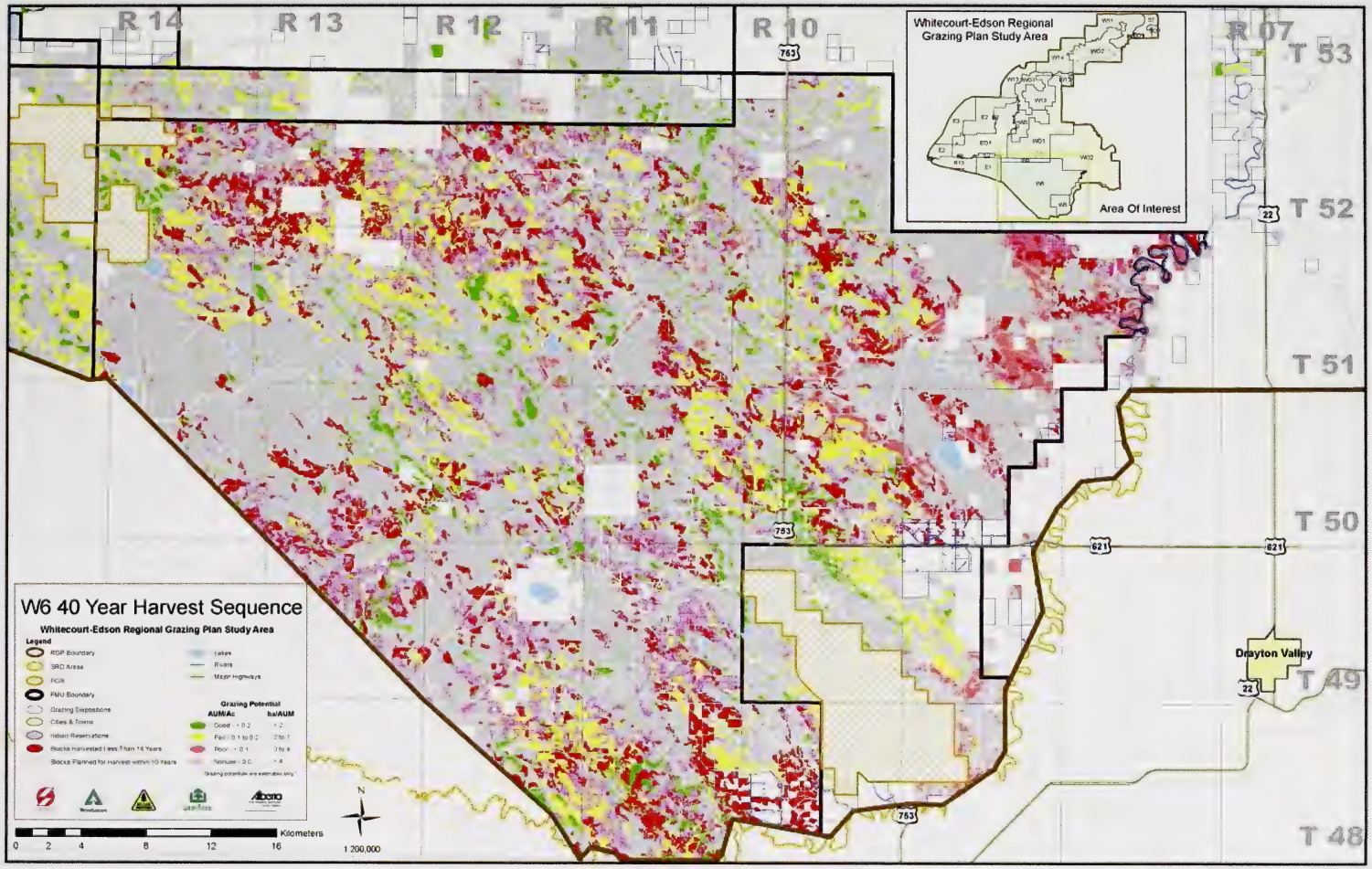

W5 60 Year Harvest Sequence
Whitecourt-Edson Regional Grazing Plan
Legend
Grazing Potential
AUM/Ac
ha/AUM
N
1:200,000
0 2 4 8 12 16
Kilometers

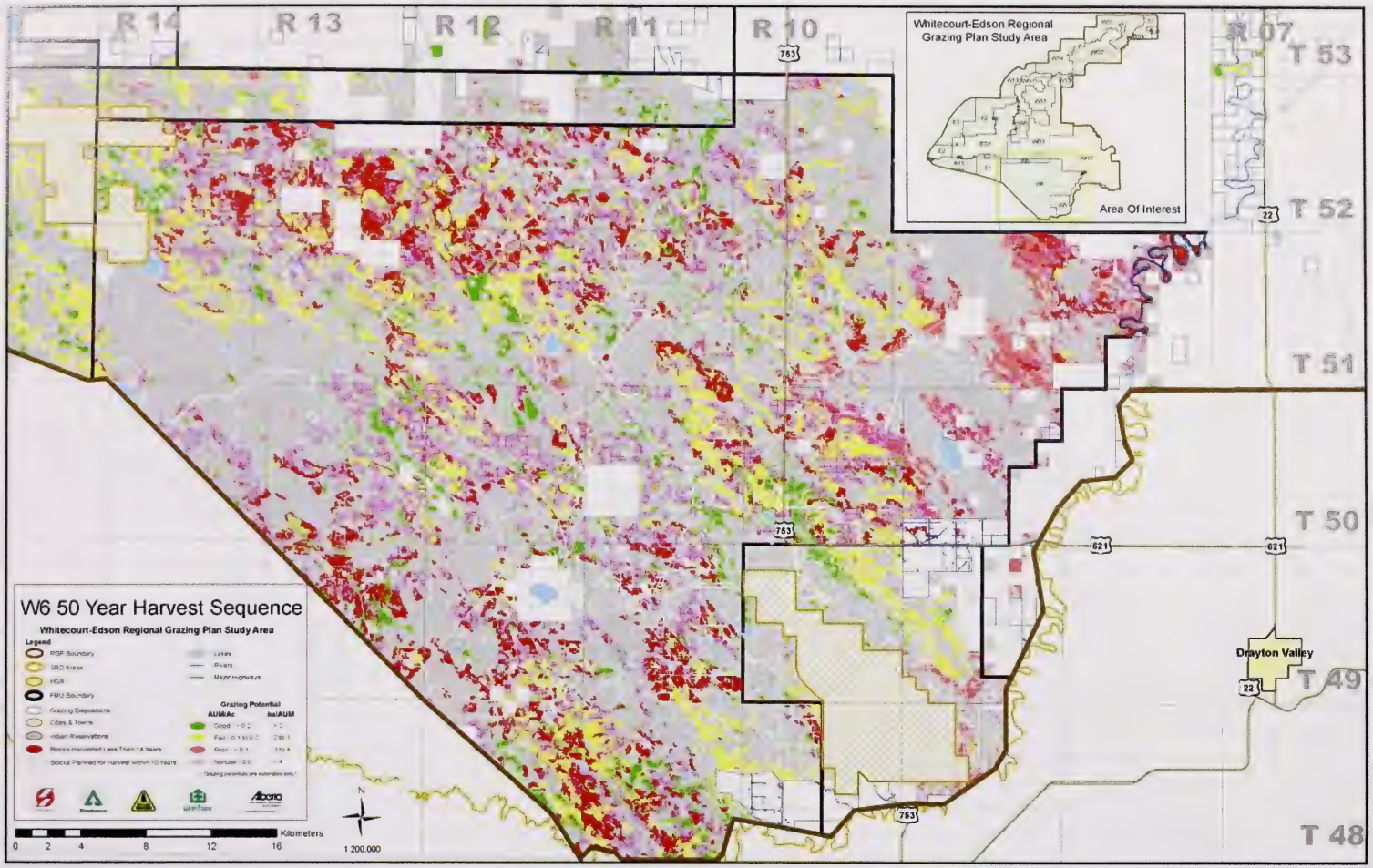
APPENDIX 9: FMU E6 Current and Projected Grazing Potential Maps

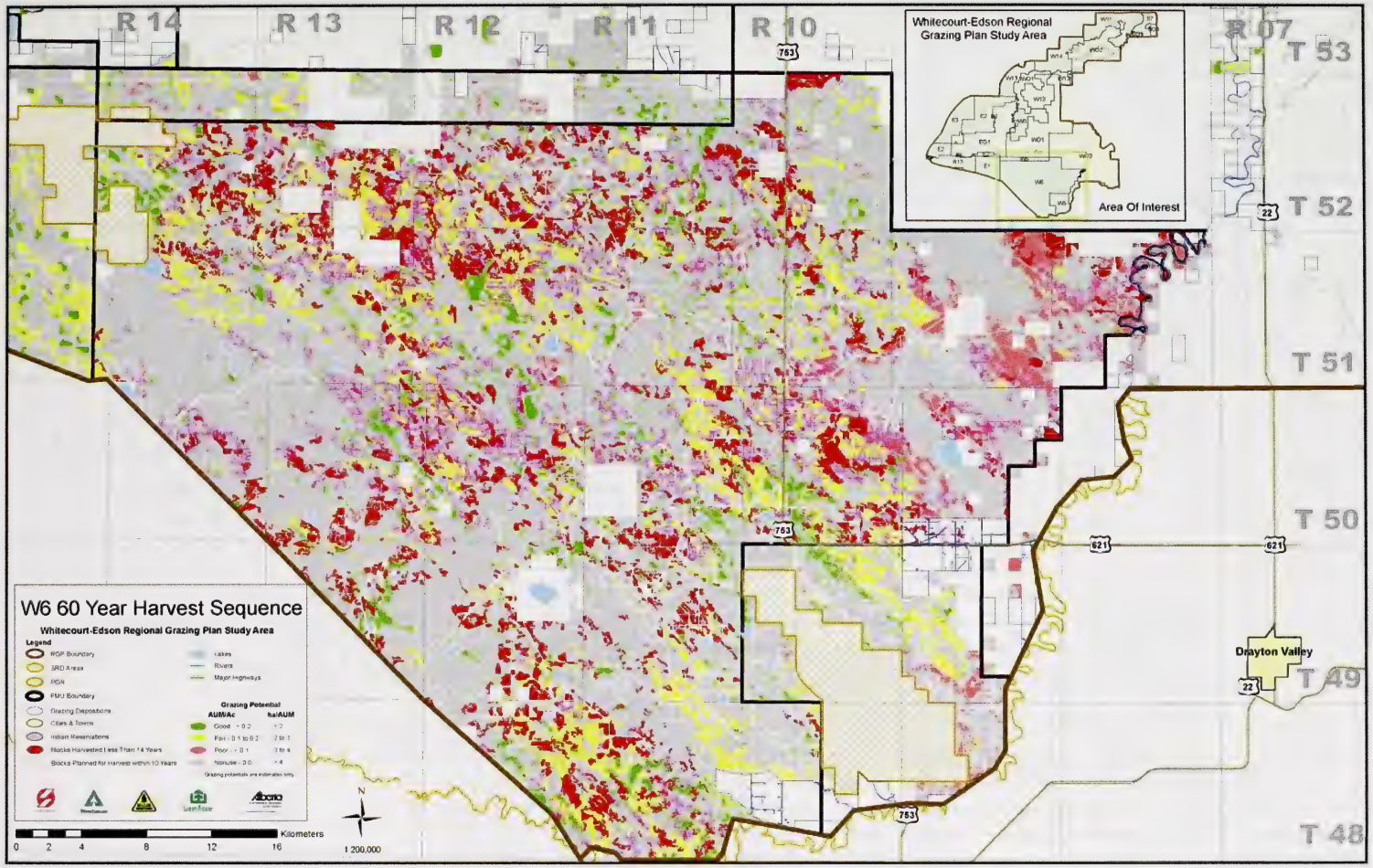



R 14
R 13
R 12
R 11
R 10
R 07
T 53
T 52
T 51
T 50
T 49
T 48
763
22
621
Drayton Valley
Whitecourt-Edson Regional Grazing Plan Study Area
Area Of Interest
W6 20 Year Harvest Sequence
Whitecourt-Edson Regional Grazing Plan Study Area
Legend
Grazing Potential
AUM/Ac
ha/AUM
Kilometers
0 2 4 8 12 16
1:200,000
N

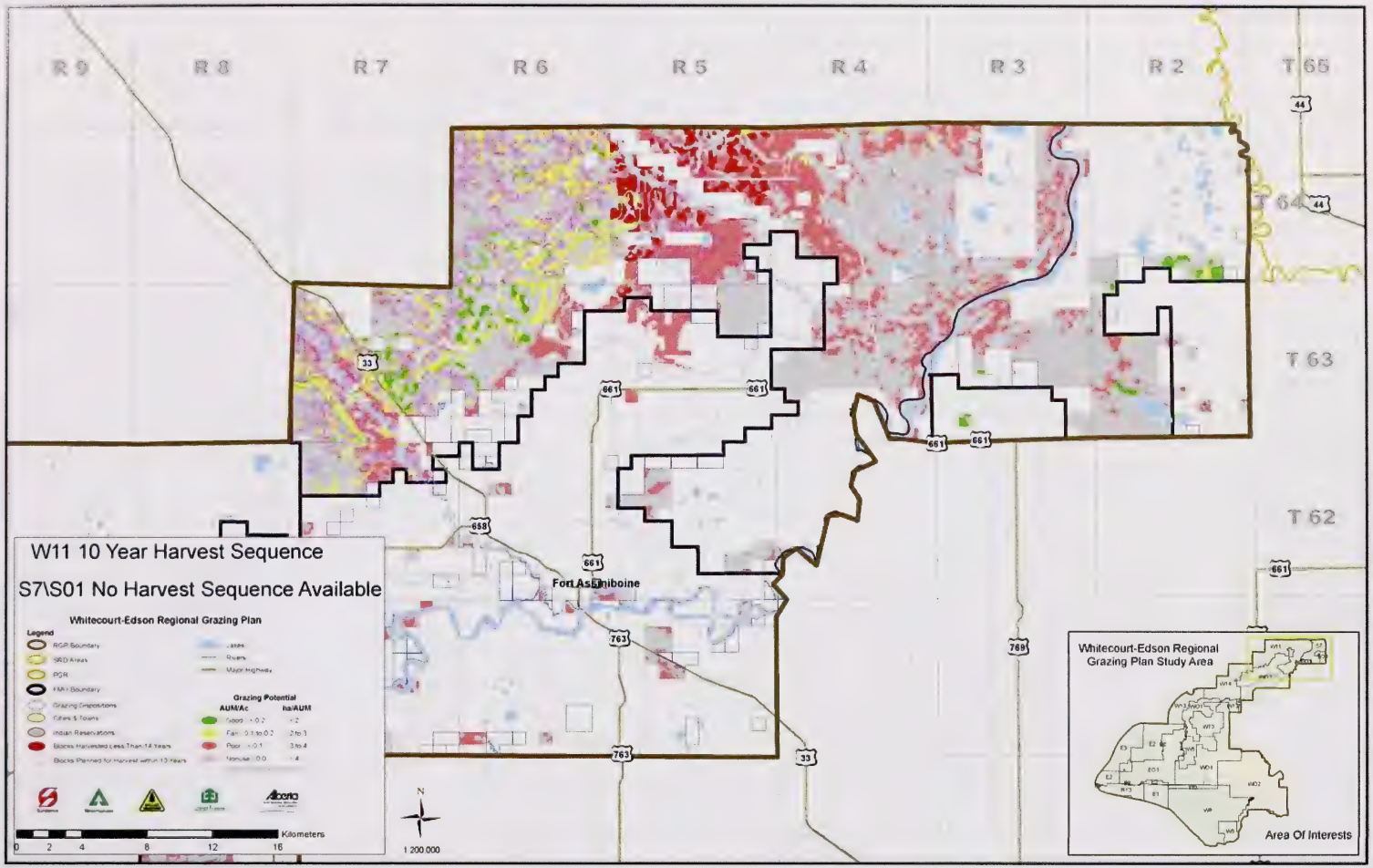

R 14
R 13
R 12
R 11
R 10
R 09
R 07
T 53
T 52
T 51
T 50
T 49
T 48
763
621
22
Whitecourt-Edson Regional Grazing Plan Study Area
Area Of Interest
Drayton Valley
W6 30 Year Harvest Sequence
Whitecourt-Edson Regional Grazing Plan Study Area
Legend
Grazing Potential
AUM/Ac
ha/AUM
Kilometers
0 2 4 8 12 16
1:200,000
N

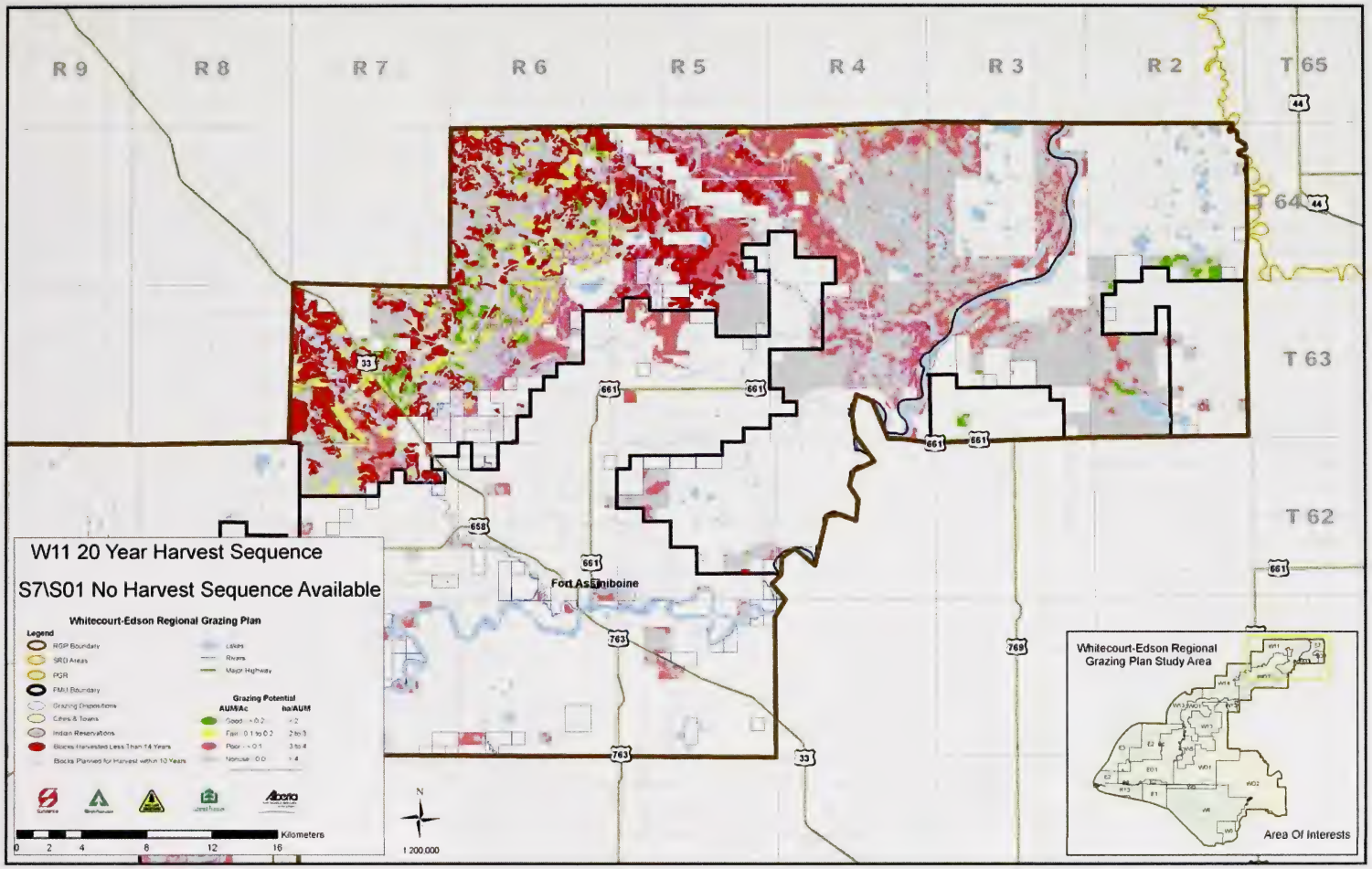

R 14
R 13
R 12
R 11
R 10
R 07
T 53
T 52
T 51
T 50
T 49
T 48
763
22
621
Drayton Valley
Whitecourt-Edson Regional Grazing Plan Study Area
Area Of Interest
W6 40 Year Harvest Sequence
Whitecourt-Edson Regional Grazing Plan Study Area
Legend
Grazing Potential
AUM/Ac
ha/AUM
Lakes
Rivers
Major Highways
Cities & Towns
Indian Reservations
PMU Boundary
Kilometers
0 2 4 8 12 16
N
1:200,000

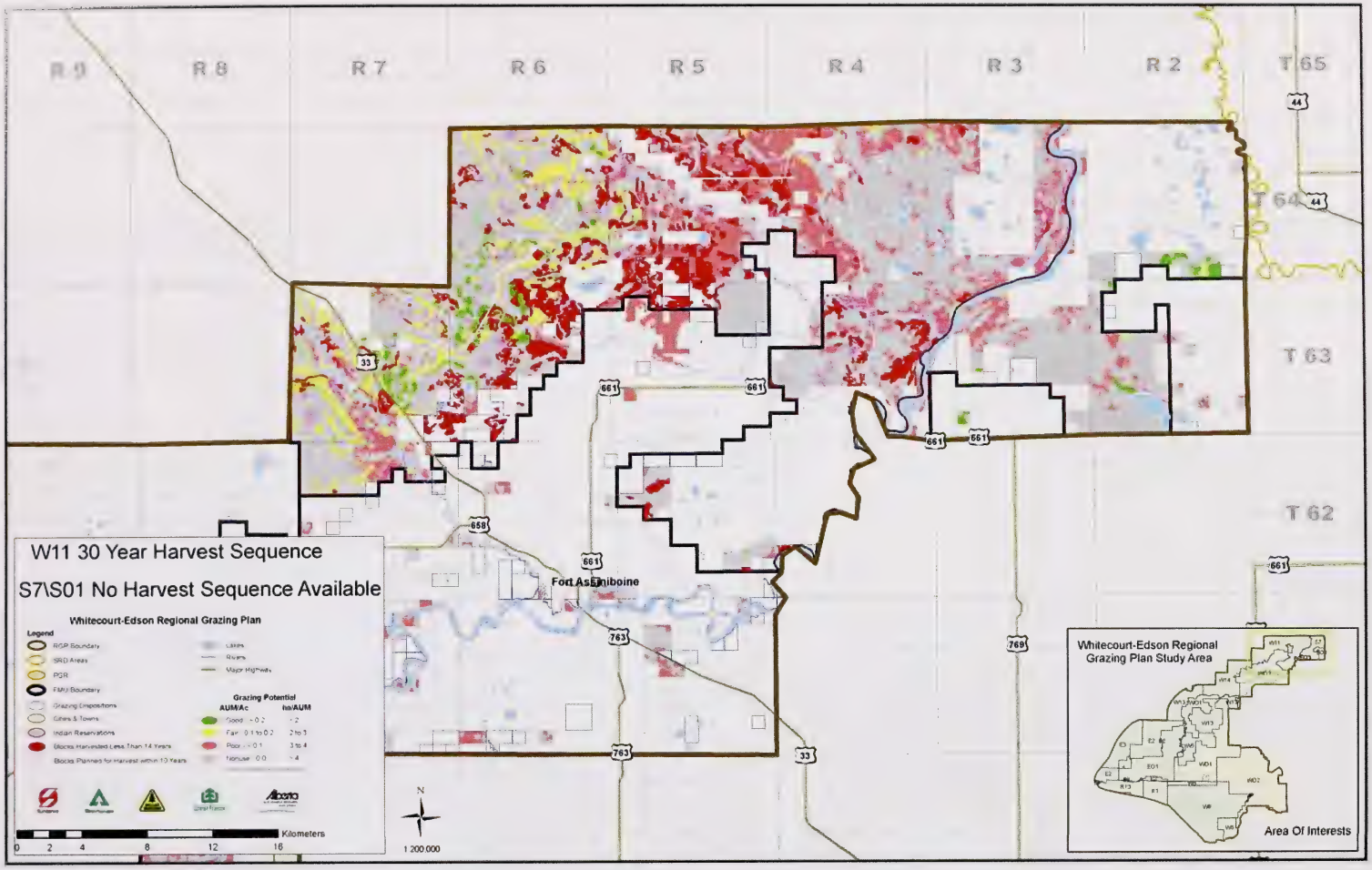

R 14
R 13
R 12
R 11
R 10
R 07
T 53
T 52
T 51
T 50
T 49
T 48
763
22
621
Drayton Valley
Whitecourt-Edson Regional Grazing Plan Study Area
Area Of Interest
W6 50 Year Harvest Sequence
Whitecourt-Edson Regional Grazing Plan Study Area
Legend
Grazing Potential
AUM/Ac
ha/AUM
Kilometers
0 2 4 8 12 16
1:200,000
N

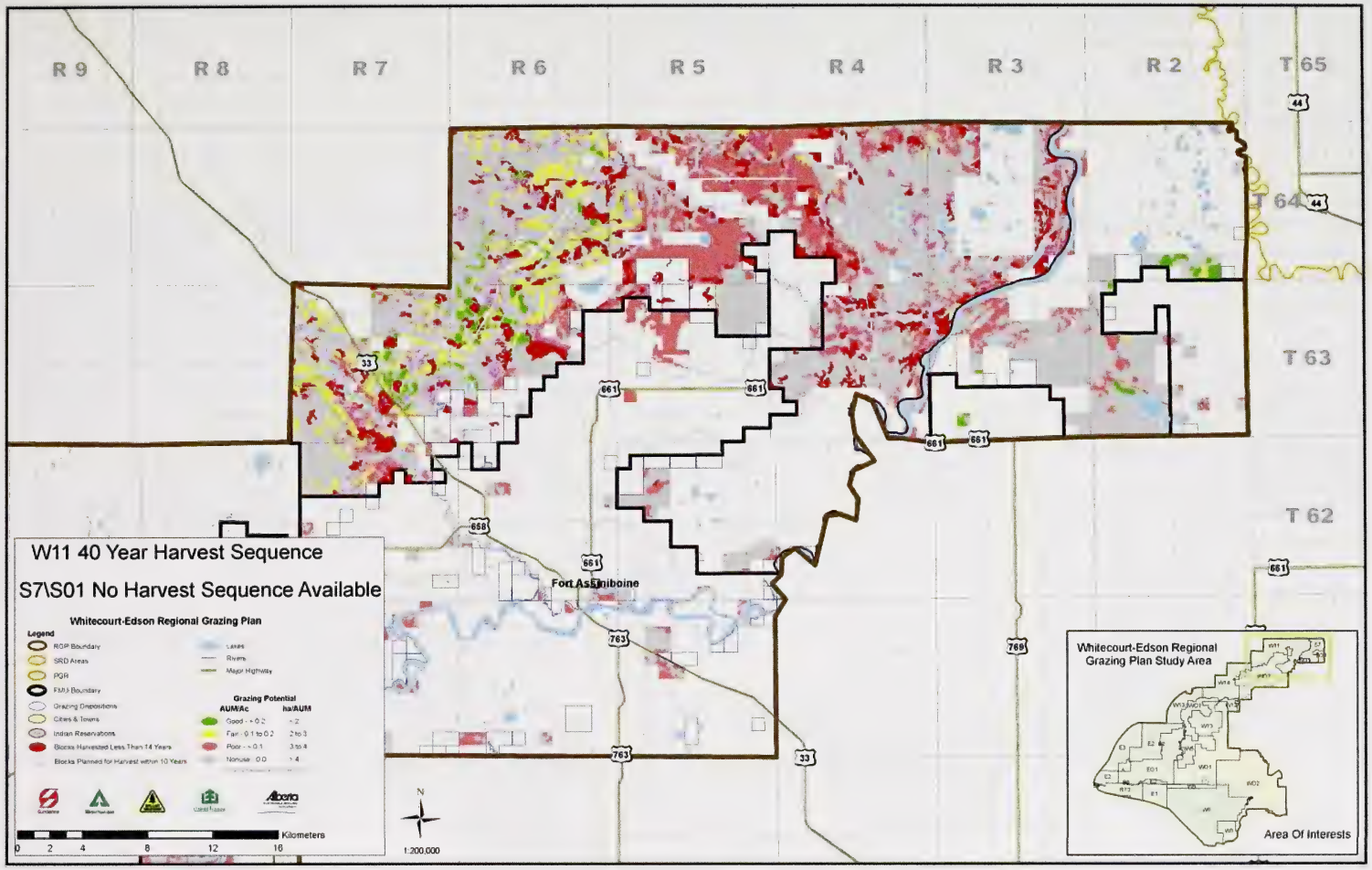

R 14
R 13
R 12
R 11
R 10
R 07
T 53
T 52
T 51
T 50
T 49
T 48
753
22
621
Drayton Valley
Whitecourt-Edson Regional Grazing Plan Study Area
Area Of Interest
W6 60 Year Harvest Sequence
Whitecourt-Edson Regional Grazing Plan Study Area
Legend
RGP Boundary
SRD Areas
RSN
FMU Boundary
Grazing Depositions
Cities & Towns
Indian Reservations
Blocks Harvested Less Than 14 Years
Blocks Planned for Harvest within 10 Years
Lakes
Rivers
Major Highways
Grazing Potential
AUM/Ac
ha/AUM
Good
Fair
Poor
Nonuse
Grazing potentials are estimates only
Kilometers
0 2 4 8 12 16
1:200,000
N

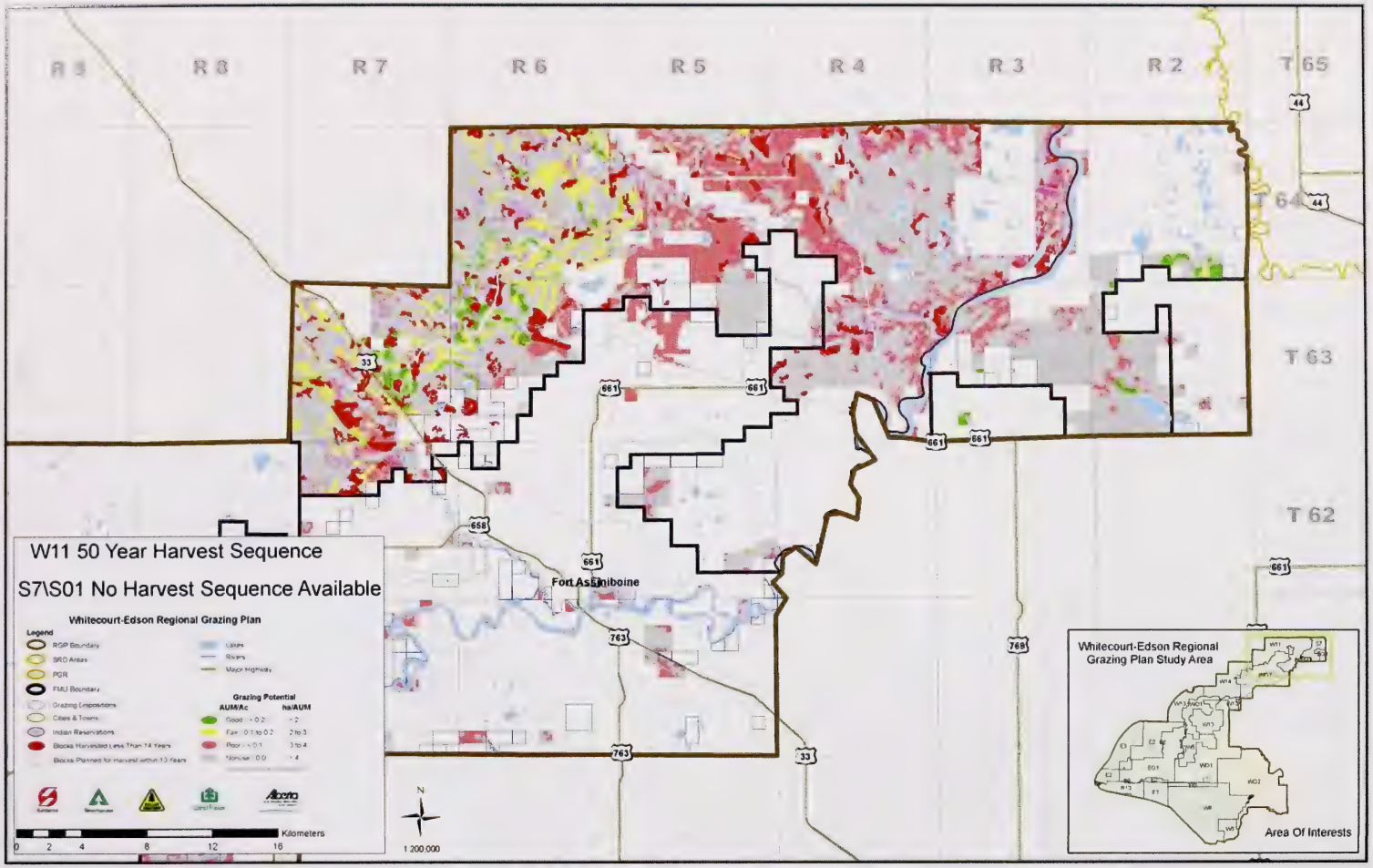
APPENDIX 10: FMU W11, S7 and SO7 Current and Projected Grazing Potential Maps

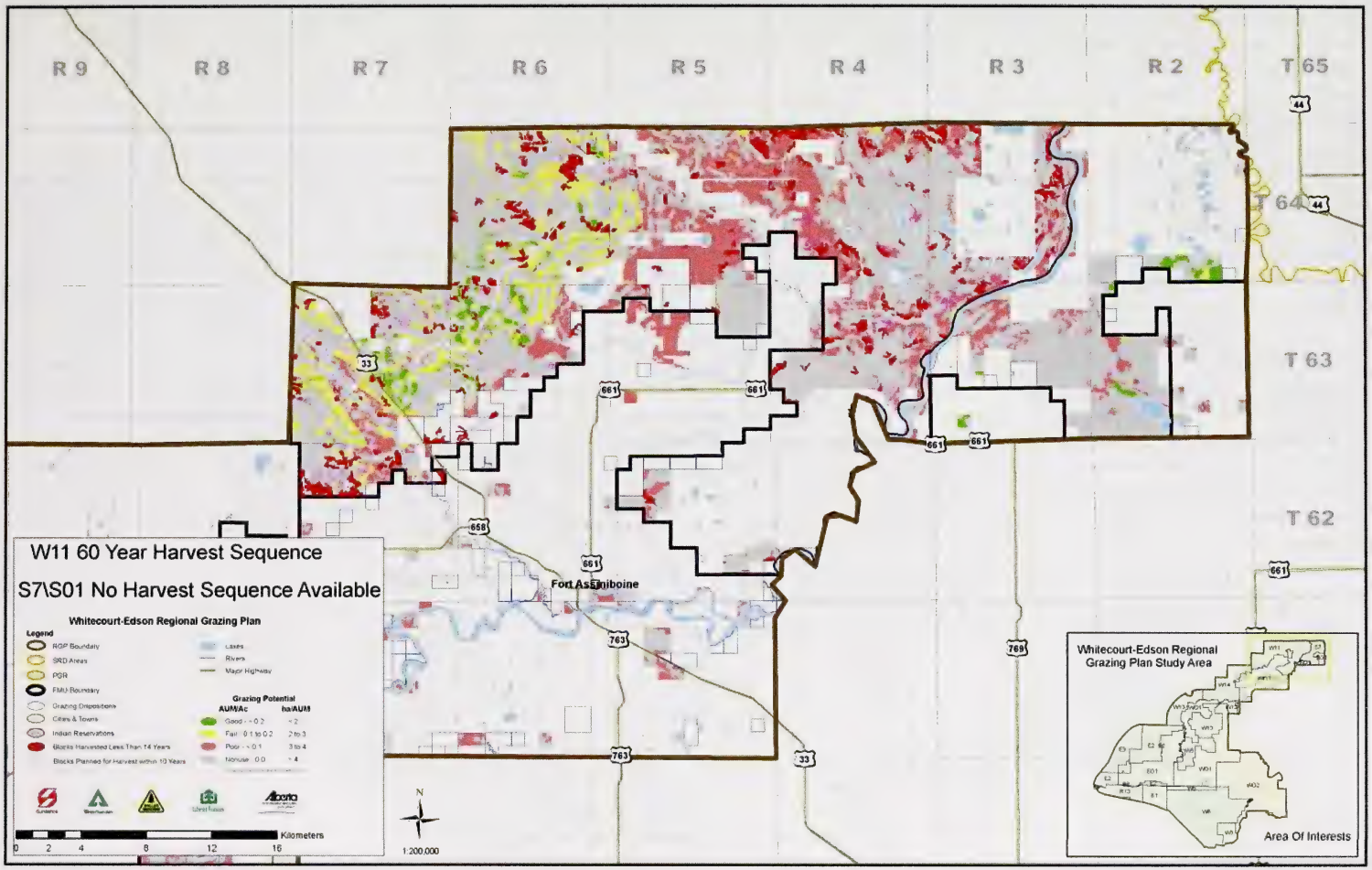



R 9
R 8
R 7
R 6
R 5
R 4
R 3
R 2
T 65
T 64
T 63
T 62
W11 20 Year Harvest Sequence
S7\S01 No Harvest Sequence Available
Whitecourt-Edson Regional Grazing Plan
Legend
Grazing Potential
AUM/Ac
ha/AUM
Kilometers
0 2 4 8 12 16
1:200,000
Fort Assiniboine
Whitecourt-Edson Regional Grazing Plan Study Area
Area Of Interests

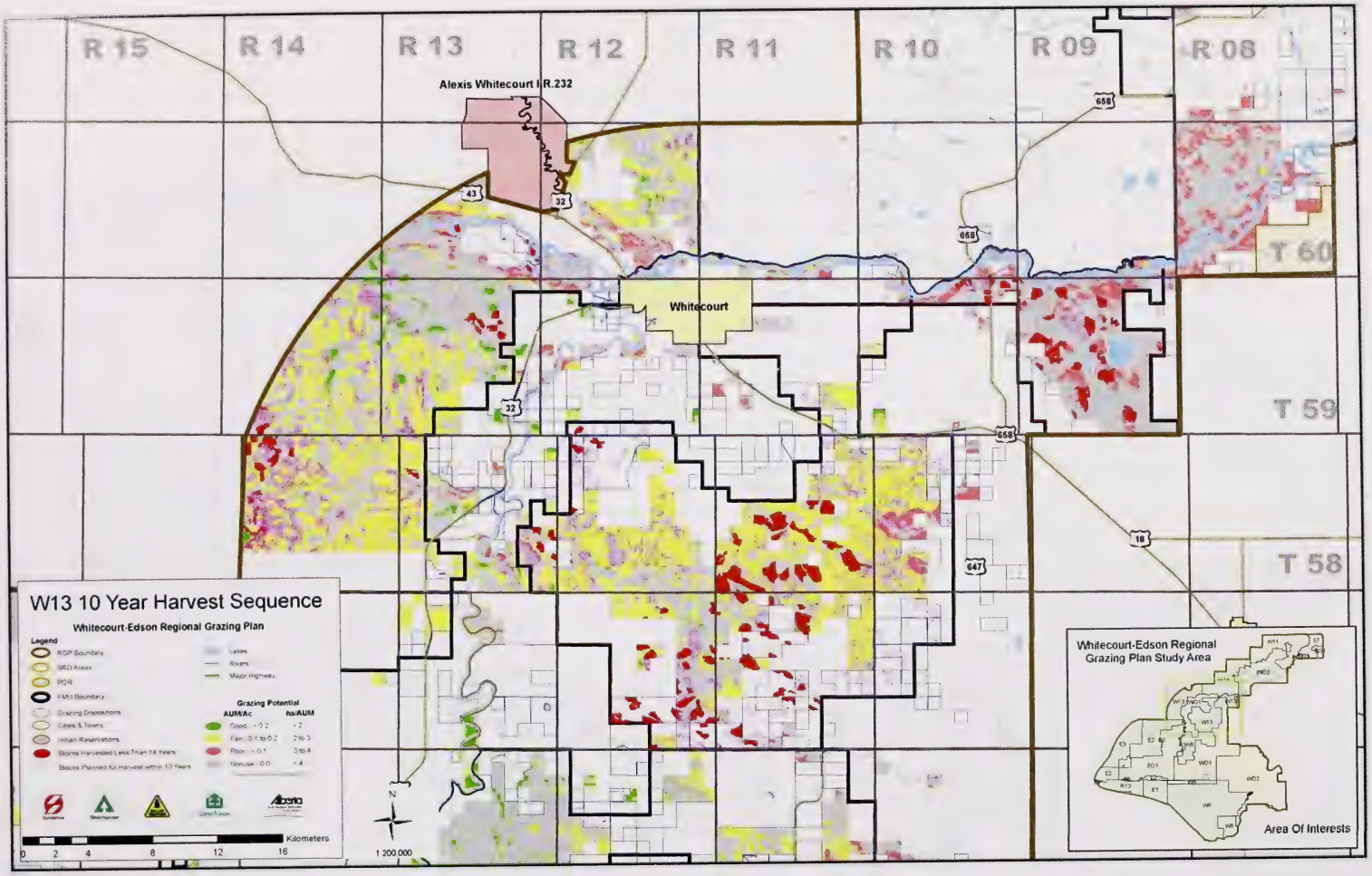

R9
R8
R7
R6
R5
R4
R3
R2
T65
T64
T63
T62
W11 30 Year Harvest Sequence
S7\S01 No Harvest Sequence Available
Whitecourt-Edson Regional Grazing Plan
Legend
Grazing Potential
AUM/Ac
ha/AUM
Kilometers
0 2 4 8 12 16
1:200,000
Fort Assiniboine
Whitecourt-Edson Regional Grazing Plan Study Area
Area Of Interests

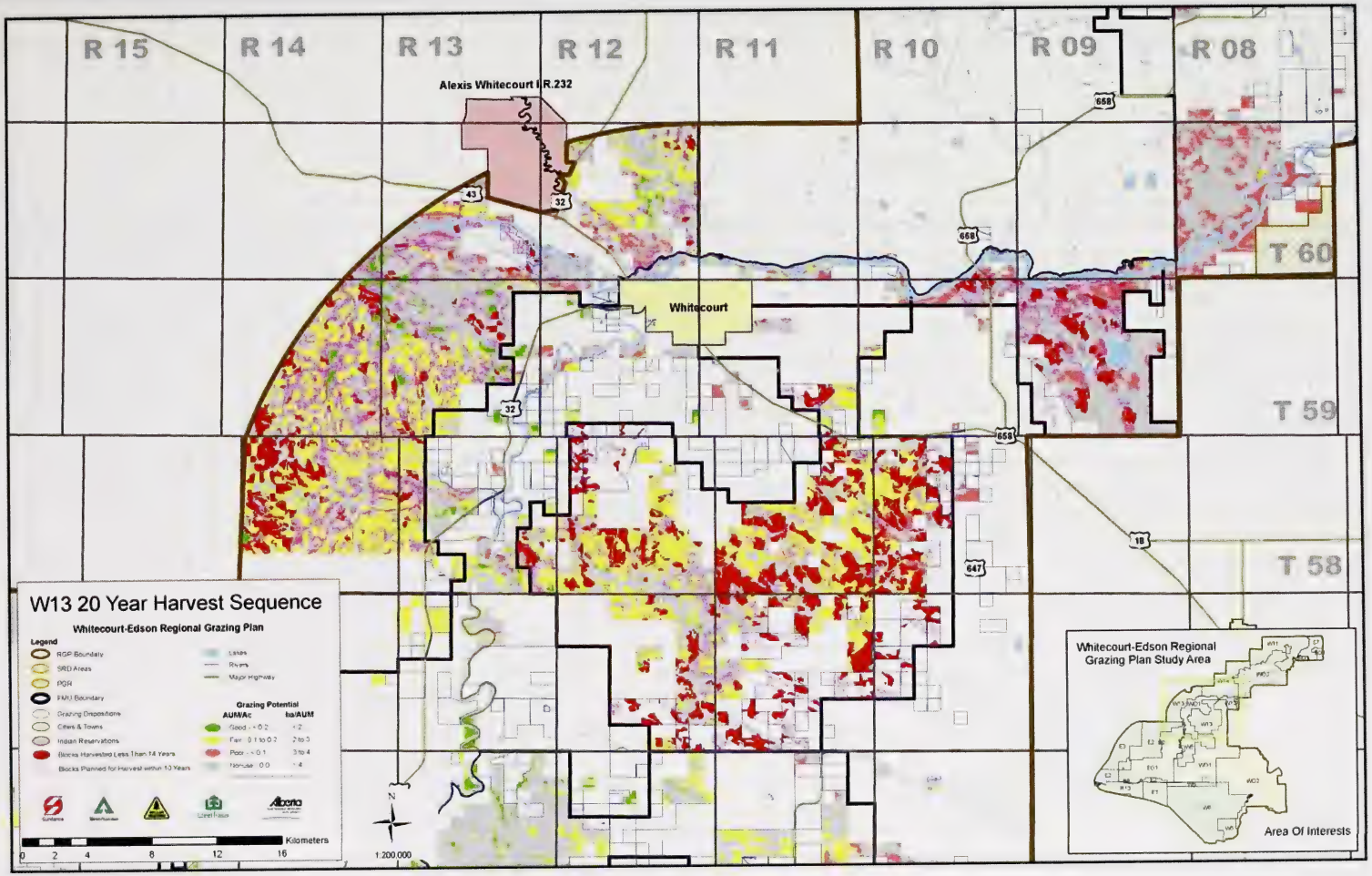

R 9
R 8
R 7
R 6
R 5
R 4
R 3
R 2
T 65
T 64
T 63
T 62
W11 40 Year Harvest Sequence
S7\S01 No Harvest Sequence Available
Whitecourt-Edson Regional Grazing Plan
Legend
RGP Boundary
SRD Areas
PGR
FMU Boundary
Grazing Dispositions
Cities & Towns
Indian Reservations
Blocks Harvested Less Than 14 Years
Blocks Planned for Harvest within 10 Years
Lakes
Rivers
Major Highway
Grazing Potential
AUM/Ac
ha/AUM
Good - > 0.2
< 2
Fair - 0.1 to 0.2
2 to 3
Poor - < 0.1
3 to 4
Nonuse - 0.0
> 4
Kilometers
0 2 4 8 12 16
N
1:200,000
Fort Assiniboine
Whitecourt-Edson Regional Grazing Plan Study Area
Area Of Interests

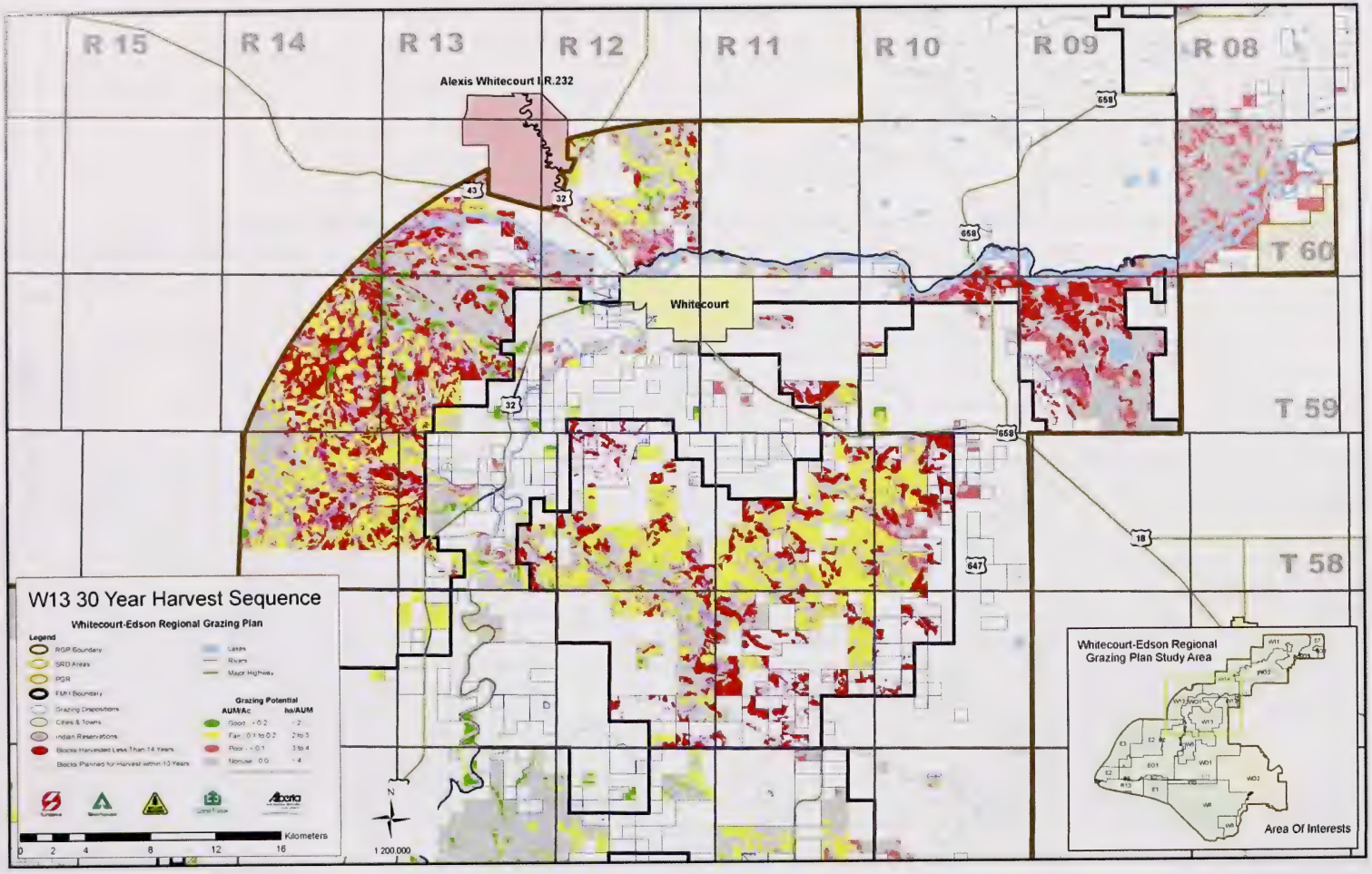

R 8
R 7
R 6
R 5
R 4
R 3
R 2
T 65
T 64
T 63
T 62
W11 50 Year Harvest Sequence
S7\S01 No Harvest Sequence Available
Whitecourt-Edson Regional Grazing Plan
Legend
RGP Boundary
SRD Areas
PGR
FMU Boundary
Grazing Dispositions
Cities & Towns
Indian Reservations
Blocks Harvested Less Than 14 Years
Blocks Planned for Harvest within 13 Years
Lakes
Rivers
Major Highway
Grazing Potential
AUM/Ac
ha/AUM
Good
Fair
Poor
Kilometers
0 2 4 8 12 16
N
1:200,000
Fort Assiniboine
Whitecourt-Edson Regional Grazing Plan Study Area
Area Of Interests

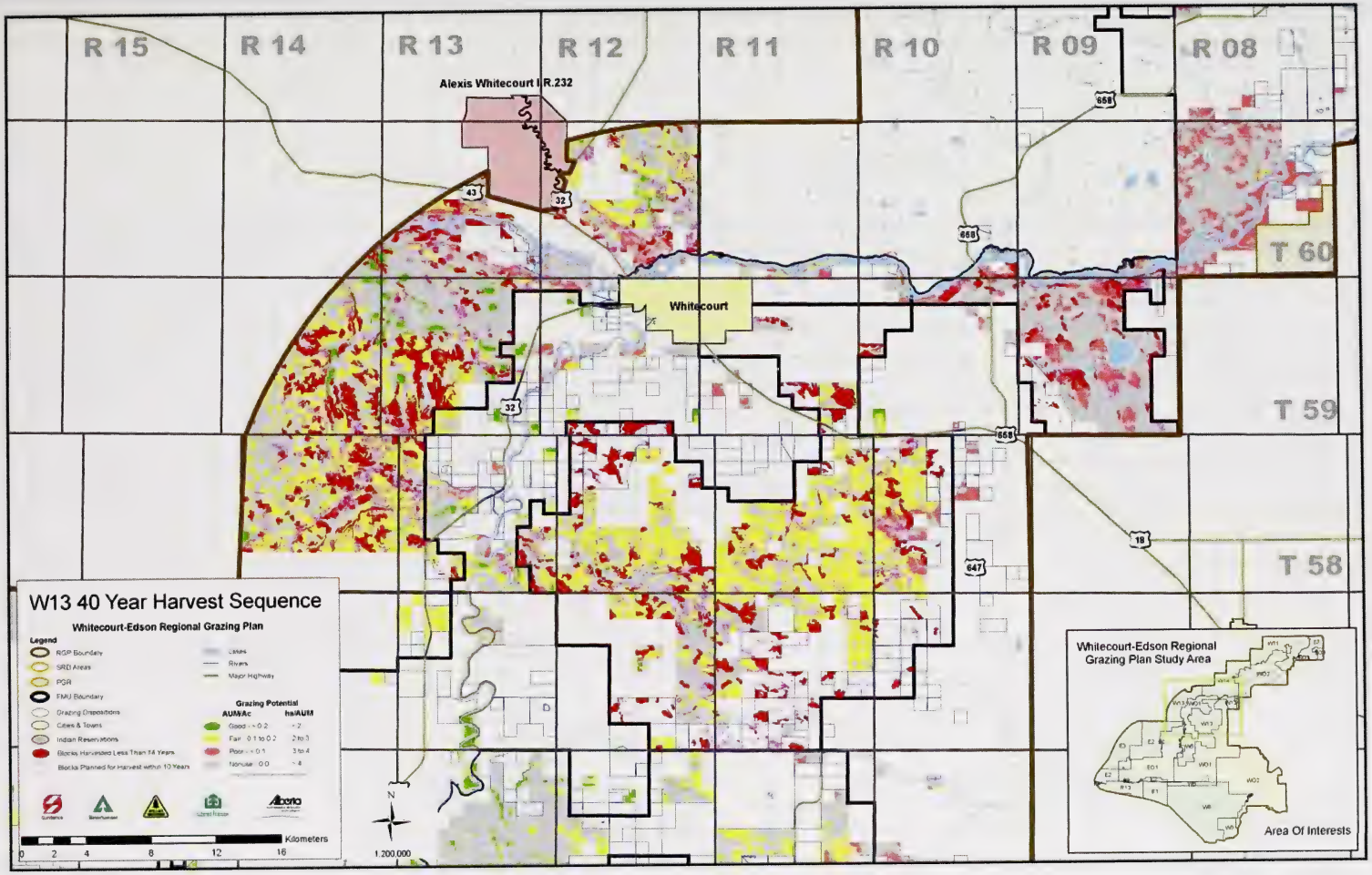

R 9
R 8
R 7
R 6
R 5
R 4
R 3
R 2
T 65
T 64
T 63
T 62
W11 60 Year Harvest Sequence
S7\S01 No Harvest Sequence Available
Whitecourt-Edson Regional Grazing Plan
Legend
RGP Boundary
SRD Areas
PGR
FMU Boundary
Grazing Dispositions
Cities & Towns
Indian Reservations
Blocks Harvested Less Than 14 Years
Blocks Planned for Harvest within 10 Years
Lakes
Rivers
Major Highway
Grazing Potential
AUM/Ac
ha/AUM
Good - > 0.2
< 2
Fair 0.1 to 0.2
2 to 3
Poor - < 0.1
3 to 4
Nonuse 0.0
> 4
Kilometers
0 2 4 8 12 16
N
1:200,000
Fort Assiniboine
Whitecourt-Edson Regional Grazing Plan Study Area
Area Of Interests

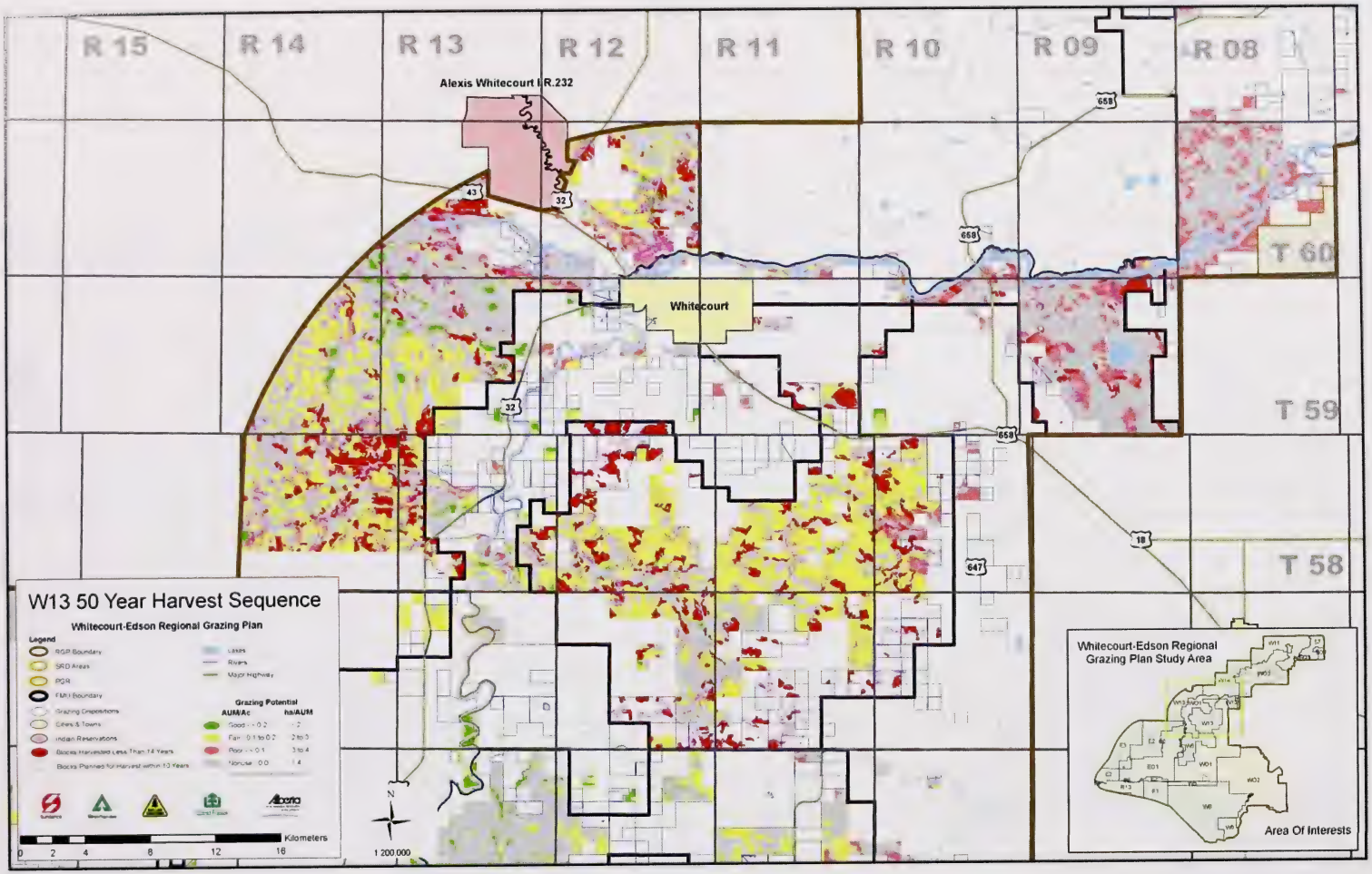
APPENDIX 11: FMU W13 Current and Projected Grazing Potential Maps

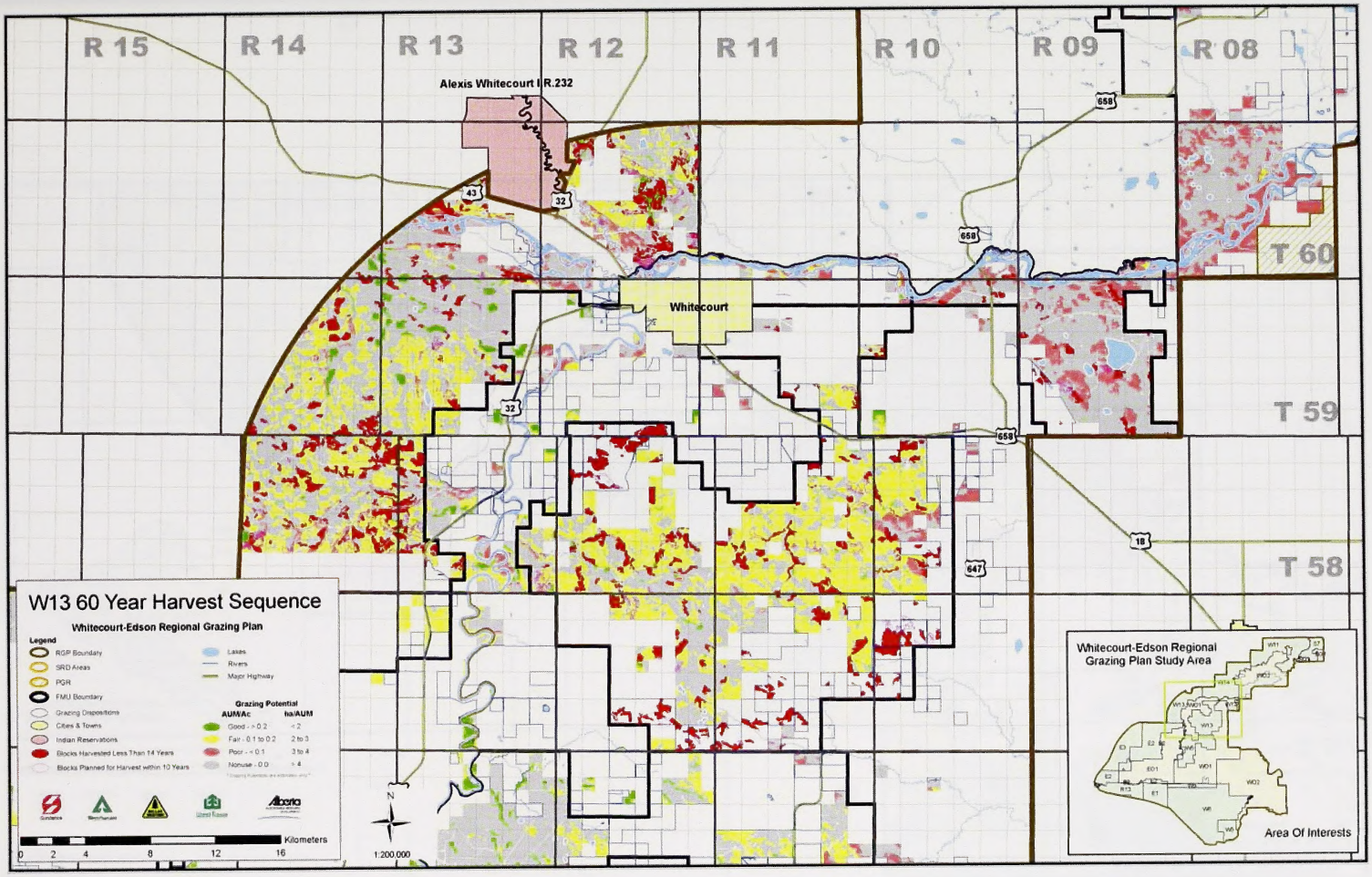



R 15
R 14
R 13
R 12
R 11
R 10
R 09
R 08
T 60
T 59
T 58
Alexis Whitecourt IR 232
Whitecourt
43
32
32
658
658
658
18
647
W13 20 Year Harvest Sequence
Whitecourt-Edson Regional Grazing Plan
Legend
RGP Boundary
SRD Areas
PGR
FMU Boundary
Grazing Dispositions
Cities & Towns
Indian Reservations
Blocks Harvested Less Than 14 Years
Blocks Planned for Harvest within 10 Years
Lakes
Rivers
Major Highway
Grazing Potential
AUM/Ac
ha/AUM
Good - > 0.2
< 2
Fair - 0.1 to 0.2
2 to 3
Poor - < 0.1
3 to 4
Non-use - 0.0
> 4
Kilometers
0
2
4
8
12
16
N
1:200,000
Whitecourt-Edson Regional
Grazing Plan Study Area
Area Of Interests

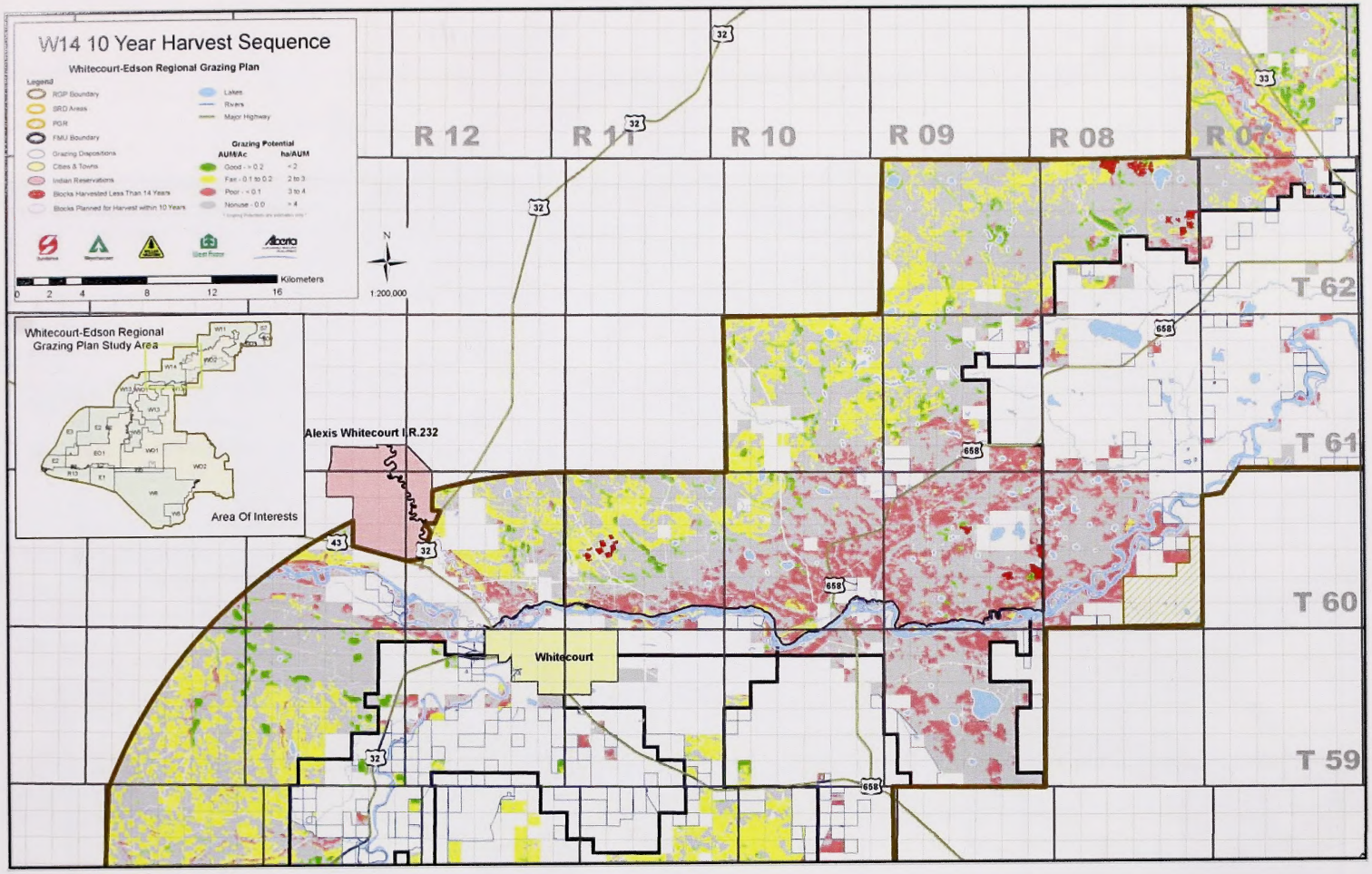

R 15
R 14
R 13
R 12
R 11
R 10
R 09
R 08
T 60
T 59
T 58
Alexis Whitecourt IR 232
Whitecourt
W13 30 Year Harvest Sequence
Whitecourt-Edson Regional Grazing Plan
Legend
RGP Boundary
SRD Areas
PGR
FMU Boundary
Grazing Dispositions
Cities & Towns
Indian Reservations
Blocks Harvested Less Than 14 Years
Blocks Planned for Harvest within 10 Years
Lakes
Rivers
Major Highway
Grazing Potential
AUM/Ac
ha/AUM
Good - 0.2 - 2
Fair - 0.1 to 0.2 - 2 to 3
Poor - <0.1 - 3 to 4
Marginal - 0 0 - 4
Kilometers
0 2 4 8 12 16
1:200,000
Whitecourt-Edson Regional Grazing Plan Study Area
Area Of Interests


R 15
R 14
R 13
R 12
R 11
R 10
R 09
R 08
T 60
T 59
T 58
Alexis Whitecourt IR 232
Whitecourt
43
32
658
647
19
W13 40 Year Harvest Sequence
Whitecourt-Edson Regional Grazing Plan
Legend
RGP Boundary
SRD Areas
PGR
FMU Boundary
Grazing Dispositions
Cities & Towns
Indian Reservations
Blocks Harvested Less Than 14 Years
Blocks Planned for Harvest within 10 Years
Lakes
Rivers
Major Highway
Grazing Potential
AUM/Ac
ha/AUM
Good
Fair
Poor
Nonuse
Kilometers
0 2 4 8 12 16
1:200,000
Whitecourt-Edson Regional Grazing Plan Study Area
Area Of Interests


R 15
R 14
R 13
R 12
R 11
R 10
R 09
R 08
T 60
T 59
T 58
Alexis Whitecourt IR 232
Whitecourt
W13 50 Year Harvest Sequence
Whitecourt-Edson Regional Grazing Plan
Legend
Grazing Potential
AUM/Ac
ha/AUM
Kilometers
0 2 4 8 12 16
1:200,000
Whitecourt-Edson Regional Grazing Plan Study Area
Area Of Interests


R 15
R 14
R 13
R 12
R 11
R 10
R 09
R 08
T 60
T 59
T 58
Alexis Whitecourt IR 232
Whitecourt
43
32
32
658
658
658
18
647
W13 60 Year Harvest Sequence
Whitecourt-Edson Regional Grazing Plan
Legend
RGP Boundary
SRD Areas
PGR
FMU Boundary
Grazing Dispositions
Cities & Towns
Indian Reservations
Blocks Harvested Less Than 14 Years
Blocks Planned for Harvest within 10 Years
Lakes
Rivers
Major Highway
Grazing Potential
AUM/Ac
ha/AUM
Good - > 0.2
< 2
Fair - 0.1 to 0.2
2 to 3
Poor - < 0.1
3 to 4
Nonuse - 0.0
> 4
Kilometers
0
2
4
8
12
16
N
1:200,000
Whitecourt-Edson Regional
Grazing Plan Study Area
Area Of Interests

APPENDIX 12: FMU W14 Current Grazing Potential Maps



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